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Pilot Study on International Information Exchange on Dioxins and Related Compounds

NATO Committee on the Challenges of Modern Society
Brussels (Belgium)

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Pilot Study On International Information Exchange on Dioxins and Related Compounds

International Exchange of Research & Technology Information on Dioxins & Related Compounds

Report Number 170
December 1989

North Atlantic Treaty Organization
Committee on the Challenges of Modern Society

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The Pilot Study on International Information Exchange on Dioxins and Related Compounds was initiated in 1985 to apply the cooperative efforts of numerous nations to address the problems associated with CDDs, CDFs, and related compounds. The Pilot Study conducted activities to examine exposure and risk assessment, technology assessment, and management of accidents involving these compounds.

One of the activities of the Pilot Study was to compile, analyze, and distribute information on research projects addressing these compounds. This report describes some of the research activities that were underway between the years of 1985-1989. The report also contains detailed analyses of funding priorities and research emphasis among NATO nations.

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EXECUTIVE SUMMARY

Chlorinated dibenzo-*p*-dioxins (CDDs), dibenzofurans (CDFs), and related compounds are recognized as potentially toxic environmental contaminants. The Pilot Study on International Information Exchange on Dioxins and Related Compounds was initiated in 1985 to apply the cooperative efforts of numerous nations to address the problems associated with CDDs, CDFs, and related compounds. The Pilot Study conducted activities to examine exposure and risk assessment, technology assessment, and management of accidents involving these compounds.

One of the activities of the Pilot Study was to compile, analyze, and distribute information on research projects addressing these compounds. This report describes some of the research activities that were underway between the years of 1985-1989. Displayed below are some of the trends identified with respect to research projects and funding in the participating NATO nations.

Overall Trends

- Total research funding on dioxins and related compounds identified through this survey (1985-1989) = $142 million.
  - Exposure and Hazard Assessment represents 53 percent ($75 million)
  - Technology Assessment represents 41 percent ($59 million)
  - Remedial Response represents 6 percent ($9 million)
- Average cost of projects per year:
  - Exposure and Hazard Assessment ($180,000)
  - Technology Assessment ($300,000).
  - Remedial Response ($390,000)
- Exposure and Hazard Assessment funding is $75 million
  - $47 million (62 percent) in effects/toxicity
  - $11 million (14 percent) in environmental assessment
  - $6 million (8 percent) in analytical methods

- In the area of Exposure and Hazard Assessment, approximately 75 percent of the total funding ($75 million) is from the United States ($56 million).

- Technology Assessment funding is $59 million

  - $31 million (52 percent) in incinerator destruction
  - $11 million (18 percent) in incinerator sources
  - $9 million (6 percent) in other destruction methods

- In the Technology Assessment area, the Federal Republic of Germany, Canada, and the United States evenly share (approximately 30 percent apiece) the total resource commitment ($59 million).

- Funding of Remedial Response projects ($9 million) includes 83 percent from the United States and 17 percent from the Federal Republic of Germany.

National Areas of Emphasis

- Canada - (Total Funding = $23 million) 68 percent is in the area of incineration of dioxins and related compounds.

- Denmark - (Total Funding = $1.2 million) 95 percent is in identification of incinerator sources of dioxins and related compounds.

- Federal Republic of Germany - (Total Funding = $30.5 million) Funding research in almost all areas, with some emphasis on control technologies.

- Italy - (Total Funding = $2.2 million) Most funding in sources, destruction technologies, and waste management.

- Netherlands - (Total Funding = $2.4 million) Funding is primarly commited to exposure and hazard assessment and source investigations.

- United Kingdom - (Total Funding = $2 million) Emphasis on environmental assessment (background levels) and incinerator sources.

- United States - (Total Funding = $81 million) Research is devoted to every area, with emphasis ($43 milion) on human health effects and toxicity investigations.

1. INTRODUCTION

This report describes the international exchange of information on research addressing chlorinated dibenzo-*p*-dioxins (CDDs), dibenzofurans (CDFs), and related compounds. The compilation of information on research projects concerning this group of chemicals was prepared to inform scientists, planners, regulatory, and funding organizations about areas being investigated. The information was collected in order to identify knowledge voids and duplicative efforts so that cooperative research efforts can be carried out on an international basis. In addition, the exchange of information on research projects facilitates planning future research activities and allocating resources.

1.1 Background

The Pilot Study of International Information Exchange on Dioxins and Related Compounds coordinated an international effort to address issues associated with chlorinated dibenzo-*p*-dioxins (CDDs), dibenzofurans (CDFs), and related compounds. The 3-year project, initiated in 1985, was conducted under the auspices of the Committee on the Challenges of Modern Society (CCMS) of the North Atlantic Treaty Organization (NATO). Participating nations included Canada, Denmark, the Federal Republic of Germany, Italy, the Netherlands, Norway, the United Kingdom, and the United States. The governments of Austria and Sweden, although not members of NATO, were involved as observers. In addition, several international organizations participated as observers, including the World Health Organization (WHO), the United Nations Environmental Programme (UNEP), the Commission of the European Communities (CEC), and the Organization for Economic Cooperation and Development (OECD). Several of the participating governments requested representatives of industrial trade organizations and nongovernmental environmental public interest groups to serve as observers on their delegations. For example, involved as observers were the Chemical Manufacturers Association representing the American chemical industry, the *Verband der Chemischen Industrie* representing the chemical industry in the Federal Republic of Germany, and the Environmental Defense Fund representing the American public interest environmental

groups. As a result, the Pilot Study benefited from the wide variety of experience and viewpoints that were contributed by the participating nations and organizations.

In addition to the major information exchange objective, secondary goals included the reduction of research program duplication and the identification of knowledge voids during the planning process. As a result, better informed decisions can be made concerning future research activities and resource allocations. When the project was initiated in 1985, it was divided into three areas of study: exposure and hazard assessment, technology assessment, and management of accidents.

The Exposure and Hazard Assessment Working Group, chaired by the United States Environmental Protection Agency, was charged with several tasks concerning research and risk assessment. Numerous information exchange activities were undertaken to promote interaction and to identify duplicative efforts and knowledge voids. Some of these activities included: a listing of laboratories with analytical capabilities for dioxins and related compounds; an inventory of regulations and statutes concerning dioxins and related compounds; and methods used for risk and exposure assessment in the participating nations.

1.2 The Exchange of Information on Research Projects

One of the primary mechanisms for fulfilling the objectives of the project was the collection, analyses, and distribution of reports containing information on research activities. The first product of this Pilot Study, CCMS Report Number 160, was a compilation of summaries (Research Formats) published in the spring of 1986. The document contains descriptions of 158 projects which were underway in seven nations and was distributed through CCMS channels. Based on the considerable interest generated by the first compilation, the participants of the Pilot Study elected to collect a second round of information on research activities. As a result of more intense solicitations, 232 Research Formats were collected. An interim version of the compilation was published in CCMS Report Number 166 and distributed through CCMS channels as well as to

approximately 500 registrants at the Seventh International Symposium on Chlorinated Dioxins and Related Compounds (Dioxin '87) in October 1987.

This report, CCMS Report Number 170, is a revised compilation of the Research Formats from the two previous reports. This updated report contains a compilation of information on dioxin-related research presently being or having been pursued in the participating nations in the Pilot Study. The Formats were distributed to and prepared by investigators and/or program managers representing the various participating agencies and laboratories. The purpose of this publication and the interim reports is to stimulate communication and collaboration among the investigators and program managers; and to provide a clear understanding of the research focus of the various participants and; to identify gaps in the overall research effort. The number of research projects described in Reports 160, 166, and 170, are presented by participating nation in Table 1.

1.3 Data Collection

The data presented in this report provide a qualitative indication regarding the research focus and resource allocation of each of the countries or agencies involved in research on CDDs and CDFs. The solicitation of input (Formats) by the Chairpersons and the lead delegates from each country was committed but there is no measure of the comprehensiveness of either the canvass or the response. The Formats were completed by the investigators and submitted through each lead delegate. As a result, the accuracy of the information and conclusions are dependent upon the information submitted. Also, because of inconsistencies in the reporting of data for years past as well as the predictability of data for the future, data for 1986, 1987, and 1988 are considered of somewhat better quality than the other two years.

Figures 1a and 1b present the two sides of the Format distributed to participants, while Figure 2 presents the accompanying set of instructions for its preparation. Project and resource information was requested for the 5-year period 1985-1989. The resources reported were to indicate the total expenditure (or expected expenditure) within each calendar year.

The reverse side of the Format (Figure 1b) includes a series of key words to be selected by the authors. The second column contains primary key words that relate directly to one of the three working groups; i.e., Exposure and Hazard Assessment (Working Group A), Technology Assessment (Working Group B), and Management of Accidents (Working Group C). The third column contains secondary key words which bear a similar, albeit not as direct, relationship to one or more of the working groups. The

Table 1. Number of Formats Describing Research Activities Submitted by Participating Nation for CCMS Reports

Participating Nation	CCMS Report 160 Spring 1986	CCMS Report 166 October 1987	CCMS Report 170 December 1989
Canada	45	46	47
Denmark	-	-	6
Federal Republic of Germany	26	26	57
Italy	17	6	33
Netherlands	12	22	22
Norway	4	-	-
Sweden[1]	-	1	1
United Kingdom	2	4	5
United States	52	127	127
WHO[1]			
Total	158	232	282

- Denotes that no information was submitted for inclusion in these publications.

[1]Sweden and the World Health Organization are involved only as observers, and are not NATO-Participating Nations.

final column contains further delimiters. The working group and the primary and secondary key words have been used to order the discussion and the graphic displays which follow. After evaluating the responses the Formats were grouped into the following 13 topical areas; 7 of which are under Exposure and Hazard Assessment, 5 under Technology Assessment, and under Management of Accidents.

Working Group	Topical Area
Exposure and Hazard Assessment	Environmental Assessment Exposure Assessment Risk Assessment Effects/Toxicity/Assessment Sampling Methodology Properties of Dioxins Analytical Methods
Technology Assessment	Incineration Sources Other Sources Destruction by Incineration Destruction by Other Means Waste Management
Management of Accidents	Remedial Response

2. DISCUSSION

Table 2a displays the funds expended or projected to be expended during calendar years 1985 through 1989 for projects included under each of the three Working Groups; i.e., Exposure and Hazard Assessment, Technology Assessment, and Management of Accidents. Also shown is the 5-year total for each Working Group and the total for this information exchange project; i.e., approximately $142.4 million. Table 2b shows the number of project-years associated with those resources and Table 2c shows the average cost per project per year for each year and for each of the Working Groups. The value of project-year is used in this report to account for those projects which continue over longer time periods. The same information presented in the previously mentioned tables is presented graphically in Figures 3, 4, and 5.

The apparent peak in funding and in projects (Figures 3 and 4) for Assessment and Technology programs during 1987 may be indicative of an actual increase and subsequent decrease in programmatic interest in dioxins. As 1987 was the principal year for data collection, it could also relate to differences in the thoroughness of the canvass or of data reporting for previous and out-year data.

The average cost of projects of each year (Figure 5) for the Exposure and Hazard Assessment and for the Technology Assessment Working Group is approximately $180,000 and $300,000, respectively, and is relatively constant from year to year. The average cost for Remedial Response, however, is highly variable from year to year and ranges from $160,000 per project in 1987 to $725,000 per project in 1988.

Figures 6 and 7 show the percentage of total funds and project-years respectively expended over the 5-year period by each Working Group. Of the approximately $142.4 million reported in this survey, 53 percent is for Exposure and Hazard Assessment projects (Working Group A); 41 percent is for projects in Technology Assessment (Working Group B); and 6 percent is for Remedial Response programs (Working Group C).

Table 3a presents the resource apportionment for the seven Working Group A topics by year and Table 3b presents the project-year distribution for the same topical areas and years. Figure 8 shows the resource apportionment graphically and clearly indicates the strong emphasis on health effects and toxicity assessment investigations; i.e., approximately $46.5 million of a total of $75.1 million was committed to studies in those areas. An additional $16.7 million was spent on environmental, exposure, and risk assessment studies.

Figures 9 and 10 show the percent distribution of total resources and total project-years over the 5-year program in the Exposure and Hazard Assessment Group.

Tables 4a and 4b display the resource and project-year apportionment among the five Working Group B topics over the 5-year period. Almost $55 million of the $58.6 million identified with Group B projects is committed to research programs addressing sources of CDDs and CDFs as well as destruction techniques. The balance, or $3.6 million is identified with programs for the waste management of dioxins. These data are shown graphically in Figure 11.

Figures 12 and 13 show the percentage distribution of total resources and total project-years over the 5-year program in Technology Assessment.

Tables 5a and 5b show the annual distribution of funds and numbers of projects in the area of remedial response (Working Group C). Some of the year-to-year variability in the remedial response activities is possibly due to differences between the year(s) that the program is budgeted/funded and when the work is actually performed/completed.

Table 6a shows the total funds expended or projected to be expended individually by each of the participating nations over the 5-year program under each of the 13 topical areas. Table 6b shows the cumulative project-year effort by each nation and Figure 14 graphically shows the average cost per project-year for the 13 topical areas.

The relative participation, in terms of funding by each country and the World Health Organization, is shown in Figure 15. Funding by nation, in each of the three working group's areas of responsibility, is shown in Figures 16-18. In the research and related activities reported under Exposure and Hazard Assessment, the United States reports the major share (74 percent) of the total. Under Technology Assessment, the Federal Republic of Germany, Canada, and the United States share evenly (approximately 30 percent apiece) in the total resource commitment. The remaining 9 percent is shared among Italy, Denmark, the Netherlands, United Kingdom and The World Health Organization. The United States (83 percent) and the Federal Republic of Germany (17 percent) account for all of the resources dedicated over the 5-year period to Remedial Response.

The further distribution of the total response committed over each of the 13 topical areas by each of the participants is shown in Figures 19-31. The financial commitment and relative emphasis by each NATO country to these focused research activities is dramatically displayed on these charts.

Tables 7 through 15 present similar data regarding the resources expended or projected to be expended by each of the participants as well as the number of studies undertaken or scheduled - now broken out for each year. Figures 32 through 38 show the data graphically for those countries whose resources are distributed over several of the topical areas. Of

note is that $15.6 million of the $22.8 million (or 68.4 percent) included for Canada is for the incineration of CDDs, CDFs, and other toxic materials. Denmark indicates that 94.5 percent of their approximately $1.2 million was, or is, to be spent on the study of incinerators as sources of dioxins and related materials. The resources of the Federal Republic of Germany are distributed over most every topical area although the emphasis is on those in the general area of Technology Assessment. Italy funded, or will fund, programs almost exclusively in the area of sources, destruction technology, and waste management. The resources of the Netherlands have been, or will be, committed to Exposure and Hazard Assessment and source investigations. The United Kingdom has funded, or will fund, projects in environmental assessment and the study of incinerators as sources of dioxins. The resources of the United States are distributed over most every topical area with the main emphasis in the areas associated with Exposure and Hazard Assessment. The United States has devoted $43.2 million to human health effects and toxicity investigations. In fact, research devoted to health effects of CDDs and CDFs, such as toxicology, amounted to approximately $46.5 million (Figure 22). The United States accounted for 92 percent ($43 million) of that total, with the Federal Republic of Germany, Italy, and the Netherlands filling out the balance. The United States also contributed to research in the areas of technology assessment, including studies on incineration/destruction, control technologies, environmental levels, and identification of sources of dioxins. The United States expended approximately one-third ($18 million) of the $59 million total funding in the eight nations. In the area of Remedial Response, the United States funded 83 percent ($7.3 million) of the total expenditure in the participating nations.

3. CONCLUSIONS

Even in the absence of an exhaustive and quantitative canvass, the objectives of this survey have been met. The well circulated Research Formats, which include the identification of agencies, institutions, and investigators involved in both narrowly focused as well as general topical areas, have stimulated exchange and collaboration between scientific and

programmatic personnel from the various participants and other interested parties. The report strongly highlights the intensity and focus of the national or institutional programs summarized. The results have been used, for example, as input into evaluations of national and international program emphasis as well as voids. They have also been used in budget discussions to demonstrate awareness of the existence or lack of potentially supportive programs.

Although each of the NATO countries, Sweden, and the World Health Organization participated in this exchange, Canada, the Federal Republic of Germany, and particularly the United States provide the preponderance of the resources involved with research on CDDs, CDFs, and related compounds. The implicit priorities (top three) evidenced by the United States both with respect to the resources obligated and the number of projects committed to each year are: (1) for research into the toxicity and health effects associated with CDDs, CDFs, and related compounds; (2) to the efficiency and efficacy of incinerators for the destruction of these compounds, and (3) remediation efforts around contaminated areas. In contrast, the Federal Republic of Germany indicates their highest priority relates to investigations to determine the significance of dioxin sources and methods for destruction of the compounds. The FRG's second and third priorities are environmental assessment and toxicity/effects studies, respectively. Canada places most emphasis on incinerator studies with environmental assessment programs and the development of analytical methods (2nd and 3rd priorities) having significantly less emphasis.

Table 2a - Total Funding (5-Year Program)
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Assessment	13,833	17,022	23,734	14,182	6,291	75,062
Technology	9,094	18,258	20,041	6,770	4,399	58,562
Remedial Response	1,828	2,828	638	2,898	558	8,750
					TOTAL	142,374

Table 2b - Total Project-Years

Assessment	73	123	119	67	37	419
Technology	38	56	53	26	14	187
Remedial Response	6	5	4	4	3	22
					TOTAL	628

Table 2c - Average Cost/Project/Year
(In Thousands of Dollars)

						Mean
Assessment	189	138	199	212	170	182
Technology	239	326	378	260	314	303
Remedial Response	305	566	160	725	186	388

Table 3a - Working Group A
Total Funding
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Envr Assmt.	2,411	3,036	3,239	1,518	531	10,735
Exposure Assmt.	834	571	1,061	470	320	3,256
Risk Assm	1,016	512	382	322	272	2,504
Effects/Toxicity	8,515	9,921	15,116	9,100	3,866	46,518
Sampling Methods	272	1,124	1,160	834	377	3,787
Properties	379	892	517	199	161	2,148
Analytical Meth.	406	966	2,239	1,739	764	6,114
					TOTAL	75,062

Table 3b - Working Group A
Total Project-Years

Envr Assmt.	24	26	26	16	8	100
Exposure Assmt.	8	8	11	4	3	34
Risk Assmt.	7	6	5	4	3	25
Effects/Toxicity	16	41	32	20	13	122
Sampling Methods	3	7	7	5	2	24
Properties	8	16	11	4	2	41
Analytical Meth.	7	19	27	14	6	73
					TOTAL	419

Table 4a - Working Group B
Total Funding
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Incin Sources	1,775	4,539	3,257	1,061	173	10,805
Other Sources	335	874	1,650	778	491	4,128
Incin Destruct	4,377	7,834	12,350	3,175	3,000	30,736
Other Destruct	1,953	3,946	1,590	1,200	535	9,312
Waste Mgmt.	654	1,065	1,186	476	200	3,581
					TOTAL	58,562

Table 4b - Working Group B
Total Project-Years

Incin Sources	13	18	17	7	3	58
Other Sources	4	12	14	5	6	45
Incin Destruct	3	5	3	2	1	14
Other Destruct	9	11	9	5	3	37
Waste Mgmt.	8	10	10	3	1	32
					TOTAL	186

Table 5a - Working Group C
Total Funding
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Remedial Response	1,828	2,828	638	2,898	558	8,750

Table 5b - Working Group C
Total Project-Years

Remedial Response	6	5	4	4	3	22

Table 6a - Total Funding (5-Year Program)
(In Thousands of Dollars)

	CAN	DEN	FRG	ITA	NETH	SWE	UK	USA	WHO	5-YEAR TOTAL
Environ Assmt.	2118	0	3924	32	100	0	1030	3531	0	10735
Exposure Assmt.	966	0	0	0	200	0	0	2,090	0	3256
Risk Assmt.	5	0	660	0	255	0	0	1474	110	2504
Effects/Toxicity	0	0	3082	40	220	0	0	43176	0	46518
Sampling Method.	364	0	2173	0	0	0	0	1250	0	3787
Properties	281	0	260	0	279	68	0	1260	0	2148
Analytical Mthds.	1825	0	933	0	302	0	0	3054	0	6114
Incin Sources	627	1115	6682	460	934	0	987	0	0	10805
Other Sources	870	40	1943	815	60	0	0	400	0	4128
Incin Destruct	15600	25	1475	0	0	0	0	13636	0	30736
Other Destruct	0	0	5637	100	0	0	0	3575	0	9312
Waste Mgmt	144	0	2234	800	18	0	0	347	38	3581
Remedial Response	0	0	1500	0	0	0	0	7250	0	8750
TOTAL	22,800	1,180	30,503	2,247	2,368	68	2,017	81,043	148	142,374

Table 6b - Total Project-Years (5-Year Program)

Environ Assmt	43	0	14	1	7	0	7	27	0	99
Exposure Assmt.	12	0	0	0	2	0	0	20	0	34
Risk Assmt.	1	0	3	0	4	0	0	12	5	25
Effects/Toxicity	0	0	18	2	5	0	0	96	0	121
Sampling Method.	9	0	8	0	0	0	0	7	0	24
Properties	11	0	3	0	6	1	0	20	0	41
Analytical Mthds.	25	0	5	0	7	0	0	36	0	73
Incin Sources	11	5	25	4	7	0	16	0	0	68
Other Sources	5	2	25	10	2	0	0	2	0	46
Incin Destruct	5	1	2	0	0	0	0	6	0	14
Other Destruct	0	0	11	5	0	0	0	21	0	37
Waste Mgmt	5	0	16	4	1	0	0	3	3	32
Remedial Response	0	0	3	0	0	0	0	19	0	22

8090H

CANADA

Table 7a - Distribution of Resources
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Environ Assmt.	378	398	592	389	361	2,118
Exposure Assmt.	158	168	230	205	205	966
Risk Assmt.	0	5	0	0	0	5
Effects/Toxicity	0	0	0	0	0	0
Sampling Method.	2	232	110	20	0	364
Properties	75	58	58	45	45	281
Analytical Mthds.	90	205	865	595	70	1,825
Incin Sources	40	157	370	60	0	627
Other Sources	0	40	790	40	0	870
Incin Destruct	2,800	3,600	3,100	3,100	3,000	15,600
Other Destruct	0	0	0	0	0	0
Waste Mgmt	20	34	50	40	0	144
Remedial Response	0	0	0	0	0	0
TOTAL	3,563	4,897	6,165	4,494	3,681	22,800

Table 7b - Number of Studies

Environ Assmt.	9	10	11	8	5	43
Exposure Assmt.	2	3	3	2	2	12
Risk Assmt.	0	1	0	0	0	1
Effects/Toxicity	0	0	0	0	0	0
Sampling Method.	1	3	3	2	0	9
Properties	3	3	3	1	1	11
Analytical Mthds.	2	6	10	5	2	25
Incin Sources	2	5	3	1	0	11
Other Sources	0	1	3	1	0	5
Incin Destruct	1	1	1	1	1	5
Other Destruct	0	0	0	0	0	0
Waste Mgmt	1	1	2	1	0	5
Remedial Response	0	0	0	0	0	0

DENMARK

Table 8a - Distribution of Resources
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Environ Assmt.	0	0	0	0	0	0
Exposure Assmt.	0	0	0	0	0	0
Risk Assmt.	0	0	0	0	0	0
Effects/Toxicity	0	0	0	0	0	0
Sampling Method.	0	0	0	0	0	0
Properties	0	0	0	0	0	0
Analytical Mthds.	0	0	0	0	0	0
Incin Sources	60	30	525	500	0	1,115
Other Sources	0	20	0	20	0	40
Incin Destruct	0	25	0	0	0	25
Other Destruct	0	0	0	0	0	0
Waste Mgmt	0	0	0	0	0	0
Remedial Response	0	0	0	0	0	0
TOTAL	60	75	525	520	0	1,180

Table 8b - Number of Studies

Environ Assmt.	0	0	0	0	0	0
Exposure Assmt.	0	0	0	0	0	0
Risk Assmt.	0	0	0	0	0	0
Effects/Toxicity	0	0	0	0	0	0
Sampling Method.	0	0	0	0	0	0
Properties	0	0	0	0	0	0
Analytical Mthds.	0	0	0	0	0	0
Incin Sources	1	1	2	1	0	5
Other Sources	0	1	0	1	0	2
Incin Destruct	0	1	0	0	0	1
Other Destruct	0	0	0	0	0	0
Waste Mgmt	0	0	0	0	0	0
Remedial Response	0	0	0	0	0	0

FEDERAL REPUBLIC OF GERMANY

Table 9a - Distribution of Resources
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Environ Assmt.	633	1,418	1,283	590	0	3,924
Exposure Assmt.	0	0	0	0	0	0
Risk Assmt.	450	210	0	0	0	660
Effects/Toxicity	40	70	712	1,269	991	3,082
Sampling Method.	0	637	745	614	177	2,173
Properties	100	80	80	0	0	260
Analytical Mthds.	20	90	50	504	269	933
Incin Sources	1,347	3,678	1,478	126	53	6,682
Other Sources	235	404	405	588	311	1,943
Incin Destruct	590	885	0	0	0	1,475
Other Destruct	1,367	2,890	790	590	0	5,637
Waste Mgmt	539	776	683	236	0	2,234
Remedial Response	1,000	500	0	0	0	1,500
TOTAL	6,321	11,638	6,226	4,517	1,801	30,503

Table 9b - Number of Studies

Environ Assmt.	4	5	4	1	0	14
Exposure Assmt.	0	0	0	0	0	0
Risk Assmt.	2	1	0	0	0	3
Effects/Toxicity	1	1	5	7	4	18
Sampling Method.	0	2	3	2	1	8
Properties	1	1	1	0	0	3
Analytical Mthds.	1	1	1	1	1	5
Incin Sources	7	9	7	1	1	25
Other Sources	3	8	7	5	4	25
Incin Destruct	1	1	0	0	0	2
Other Destruct	4	4	2	1	0	11
Waste Mgmt	5	6	4	1	0	16
Remedial Response						

ITALY

Table 10a - Distribution of Resources
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Environ Assmt.	0	0	0	32	0	32
Exposure Assmt.	0	0	0	0	0	0
Risk Assmt.	0	0	0	0	0	0
Effects/Toxicity	20	20	0	0	0	40
Sampling Method.	0	0	0	0	0	0
Properties	0	0	0	0	0	0
Analytical Mthds.	0	0	0	0	0	0
Incin Sources	60	70	250	80	0	460
Other Sources	100	180	225	130	180	815
Incin Destruct	0	0	0	0	0	0
Other Destruct	10	15	20	25	30	100
Waste Mgmt	0	200	200	200	200	800
Remedial Response	0	0	0	0	0	0
TOTAL	190	485	695	467	410	2,247

Table 10b - Number of Studies

Environ Assmt.	0	0	0	1	0	1
Exposure Assmt.	0	0	0	0	0	0
Risk Assmt.	0	0	0	0	0	0
Effects/Toxicity	1	1	0	0	0	2
Sampling Method.	0	0	0	0	0	0
Properties	0	0	0	0	0	0
Analytical Mthds.	0	0	0	0	0	0
Incin Sources	1	1	1	1	0	4
Other Sources	2	2	2	2	2	10
Incin Destruct	0	0	0	0	0	0
Other Destruct	1	1	1	1	1	5
Waste Mgmt	0	1	1	1	1	4
Remedial Response	0	0	0	0	0	0

NETHERLANDS

Table 11a - Distribution of Resources
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Environ Assmt.	25	25	30	10	10	100
Exposure Assmt.	0	0	50	150	0	200
Risk Assmt.	0	25	180	50	0	255
Effects/Toxicity	0	25	120	75	0	220
Sampling Method.	0	0	0	0	0	0
Properties	50	110	94	25	0	279
Analytical Mthds.	0	50	172	80	0	302
Incin Sources	126	380	303	95	30	934
Other Sources	0	30	30	0	0	60
Incin Destruct	0	0	0	0	0	0
Other Destruct	0	0	0	0	0	0
Waste Mgmt	0	0	18	0	0	18
Remedial Response	0	0	0	0	0	0
TOTAL	201	846	997	485	40	2,368

Table 11b - Number of Studies

Environ Assmt.	1	2	2	1	1	7
Exposure Assmt.	0	0	1	1	0	2
Risk Assmt.	0	1	2	1	0	4
Effects/Toxicity	0	1	3	1	0	5
Sampling Method.	0	0	0	0	0	0
Properties	1	2	2	1	0	6
Analytical Mthds.	0	1	4	2	0	7
Incin Sources	1	1	2	2	1	7
Other Sources	0	1	1	0	0	2
Incin Destruct	0	0	0	0	0	0
Other Destruct	0	0	0	0	0	0
Waste Mgmt	0	0	1	0	0	1
Remedial Response	0	0	0	0	0	0

SWEDEN

Table 12a - Distribution of Resources
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Environ Assmt.	0	0	0	0	0	0
Exposure Assmt.	0	0	0	0	0	0
Risk Assmt.	0	0	0	0	0	0
Effects/Toxicity	0	0	0	0	0	0
Sampling Method.	0	0	0	0	0	0
Properties	0	68	0	0	0	68
Analytical Mthds.	0	0	0	0	0	0
Incin Sources	0	0	0	0	0	0
Other Sources	0	0	0	0	0	0
Incin Destruct	0	0	0	0	0	0
Other Destruct	0	0	0	0	0	0
Waste Mgmt	0	0	0	0	0	0
Remedial Response	0	0	0	0	0	0
TOTAL	0	68	0	0	0	68

Table 12b - Number of Studies

Environ Assmt.	0	0	0	0	0	0
Exposure Assmt.	0	0	0	0	0	0
Risk Assmt.	0	0	0	0	0	0
Effects/Toxicity	0	0	0	0	0	0
Sampling Method.	0	0	0	0	0	0
Properties	0	1	0	0	0	1
Analytical Mthds.	0	0	0	0	0	0
Incin Sources	0	0	0	0	0	0
Other Sources	0	0	0	0	0	0
Incin Destruct	0	0	0	0	0	0
Other Destruct	0	0	0	0	0	0
Waste Mgmt	0	0	0	0	0	0
Remedial Response	0	0	0	0	0	0

UNITED KINGDOM

Table 13a - Distribution of Resources
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Environ Assmt.	60	390	260	160	160	1,030
Exposure Assmt.	0	0	0	0	0	0
Risk Assmt.	0	0	0	0	0	0
Effects/Toxicity	0	0	0	0	0	0
Sampling Method.	0	0	0	0	0	0
Properties	0	0	0	0	0	0
Analytical Mthds.	0	0	0	0	0	0
Incin Sources	142	224	331	200	90	987
Other Sources	0	0	0	0	0	0
Incin Destruct	0	0	0	0	0	0
Other Destruct	0	0	0	0	0	0
Waste Mgmt	0	0	0	0	0	0
Remedial Response	0	0	0	0	0	0
TOTAL	202	614	591	360	250	2,017

Table 13b - Number of Studies

Environ Assmt.	1	2	2	1	1	7
Exposure Assmt.	0	0	0	0	0	0
Risk Assmt.	0	0	0	0	0	0
Effects/Toxicity	0	0	0	0	0	0
Sampling Method.	0	0	0	0	0	0
Properties	0	0	0	0	0	0
Analytical Mthds.	0	0	0	0	0	0
Incin Sources	1	1	2	11	1	16
Other Sources	0	0	0	0	0	0
Incin Destruct	0	0	0	0	0	0
Other Destruct	0	0	0	0	0	0
Waste Mgmt	0	0	0	0	0	0
Remedial Response	0	0	0	0	0	0

8990H

UNITED STATES

Table 14a - Distribution of Resources
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Environ Assmt.	1,315	805	1,074	337	0	3,531
Exposure Assmt.	676	403	781	115	115	2,090
Risk Assmt.	544	250	180	250	250	1,474
Effects/Toxicity	8,455	9,806	14,284	7,756	2,875	43,176
Sampling Method.	270	255	325	200	200	1,250
Properties	154	576	285	129	116	1,260
Analytical Mthds.	296	621	1,152	560	425	3,054
Incin Sources	0	0	0	0	0	0
Other Sources	0	200	200	0	0	400
Incin Destruct	987	3,324	9,250	75	0	13,636
Other Destruct	576	1,041	788	665	505	3,575
Waste Mgmt	80	35	232	0	0	347
Remedial Response	828	2,328	638	2,898	558	7,250
TOTAL	14,181	19,644	29,189	12,985	5,044	81,043

Table 14b - Number of Studies

Environ Assmt.	9	7	7	3	1	27
Exposure Assmt.	6	5	7	1	1	20
Risk Assmt.	4	2	2	2	2	12
Effects/Toxicity	14	38	23	12	9	96
Sampling Method.	2	2	1	1	1	7
Properties	3	9	5	2	1	20
Analytical Mthds.	4	11	12	6	3	36
Incin Sources	0	0	0	0	0	0
Other Sources	0	1	1	0	0	2
Incin Destruct	1	2	2	1	0	6
Other Destruct	4	6	6	3	2	21
Waste Mgmt	1	1	1	0	0	3
Remedial Response	4	4	4	4	3	19

WORLD HEALTH ORGANIZATION

Table 15a - Distribution of Resources
(In Thousands of Dollars)

	1985	1986	1987	1988	1989	5-YEAR TOTAL
Environ Assmt.	0	0	0	0	0	0
Exposure Assmt.	0	0	0	0	0	0
Risk Assmt.	22	22	22	22	22	110
Effects/Toxicity	0	0	0	0	0	0
Sampling Method.	0	0	0	0	0	0
Properties	0	0	0	0	0	0
Analytical Mthds.	0	0	0	0	0	0
Incin Sources	0	0	0	0	0	0
Other Sources	0	0	0	0	0	0
Incin Destruct	0	0	0	0	0	0
Other Destruct	0	0	0	0	0	0
Waste Mgmt	15	20	3	0	0	38
Remedial Response	0	0	0	0	0	0
TOTAL	37	42	25	22	22	148

Table 15b - Number of Studies

Environ Assmt.	0	0	0	0	0	0
Exposure Assmt.	0	0	0	0	0	0
Risk Assmt.	1	1	1	1	1	5
Effects/Toxicity	0	0	0	0	0	0
Sampling Method.	0	0	0	0	0	0
Properties	0	0	0	0	0	0
Analytical Mthds.	0	0	0	0	0	0
Incin Sources	0	0	0	0	0	0
Other Sources	0	0	0	0	0	0
Incin Destruct	0	0	0	0	0	0
Other Destruct	0	0	0	0	0	0
Waste Mgmt	1	1	1	0	0	3
Remedial Response	0	0	0	0	0	0

Figure 1a

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B C COUNTRY OF ORIGIN: _____

TITLE OF PROJECT OR ACTIVITY:

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

IDENTIFYING NUMBER: _____ STARTING DATE: ___/___/___ COMPLETION DATE: ___/___/___

GOAL/RATIONALE/SCOPE:

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Figure 1b

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

INSTRUCTIONS FOR THE PREPARATION OF THE FORMAT FOR INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

Working Group: Circle one letter to indicate the working group under which the project most appropriately falls. (A - Exposure and Hazard Assessment; B - Technology Assessment; C - Management of Accidents).

Country of Origin: Specify the country supporting the project.

Title of Project or Activity: Provide a clear, concise title which is descriptive of the project.

Name, Address and Telephone Number of Principal Investigator: Provide this detail on the individual(s) actually conducting the investigation.

Name, Address and Telephone Number of Supporting Agency: Provide this detail and include the name of that Agency's responsible project officer.

Identifying Number: Indicate Agency project identification code or contract/grant number uniquely associated with this task.

Starting Date: Indicate month, day and year when project was actually initiated.

Completion Date: Indicate the actual or estimated month, day and year when project will be completed.

Goal/Rationale/Scope: Describe the goal, rationale and scope of the project or activity. The key word listing on the reverse of the format provides an indication on how the projects will be categorized and sorted.

Estimated Resources: Indicate the total resources actually committed/expended within each calendar year to the nearest $1,000. If, for example, funding is provided during 1986 to cover an 18-month period, then that portion that will actually be expended during CY 1986 should be shown in that block and the balance reflected in the CY 1987 block. Each block should be completed with either zero, the actual/known level, or the estimated level.

Major Outputs: Provide a listing of the expected major outputs, such as reports, publications, patents, etc., from the project or activity. Include a listing of those already completed with their appropriate scientific literature citation.

Key Words: Key words are listed on the reverse of the formats and will be used as the basis for sorting the projects and activities and determining relationships between and among programs.

Select one word only from column two. The key words in that column represent the principal divisions of the working groups. Also circle one key word only from column three. Finally, all of the key words in column four that apply should be circled. Please note that key words listed in columns three and four are not partitioned according to Working Group and may be selected from any position(s) in the columns.

Figure 2.

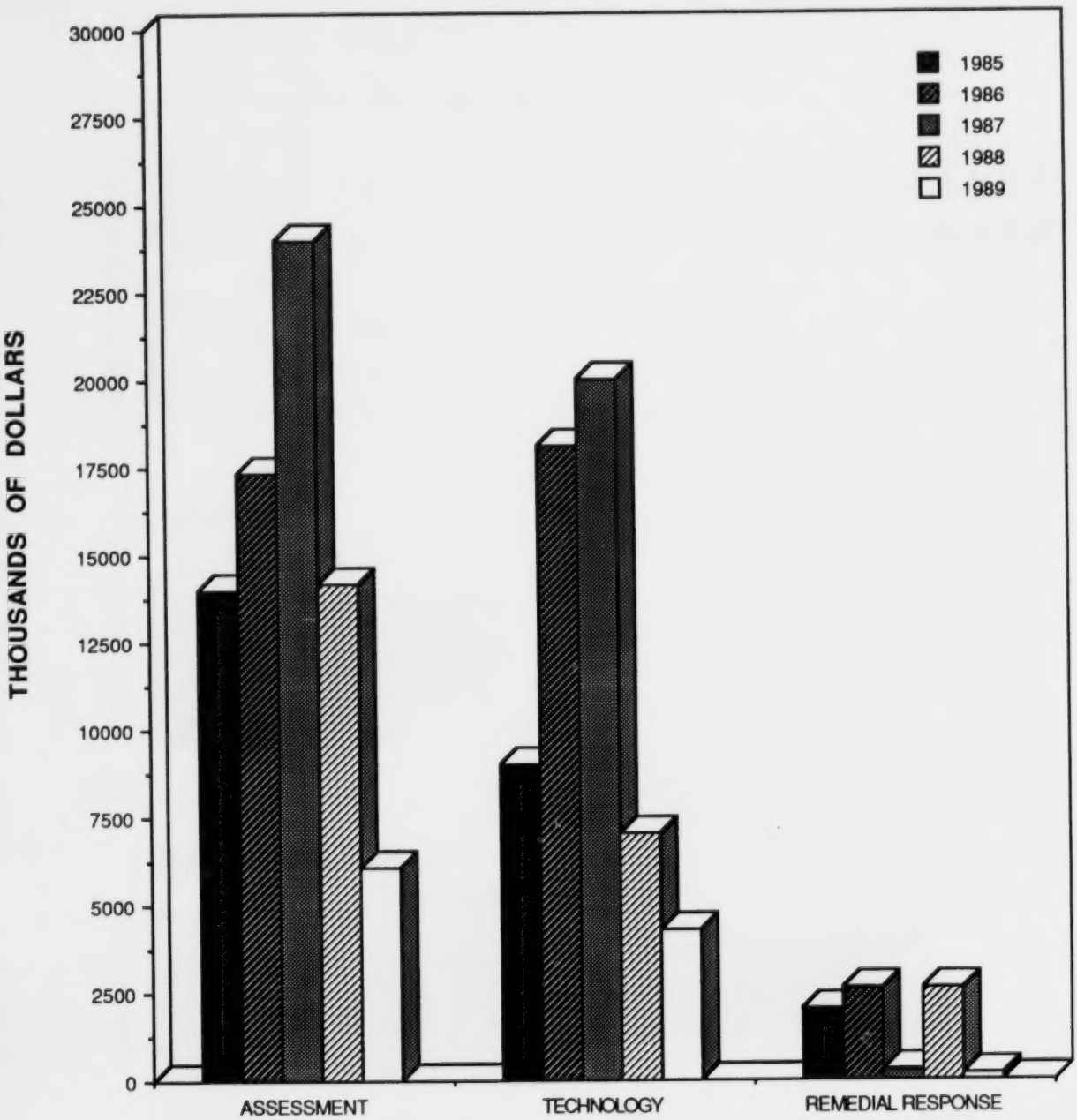

FIGURE 3. TOTAL FUNDING (5 YEAR PROGRAM), BY WORK GROUP

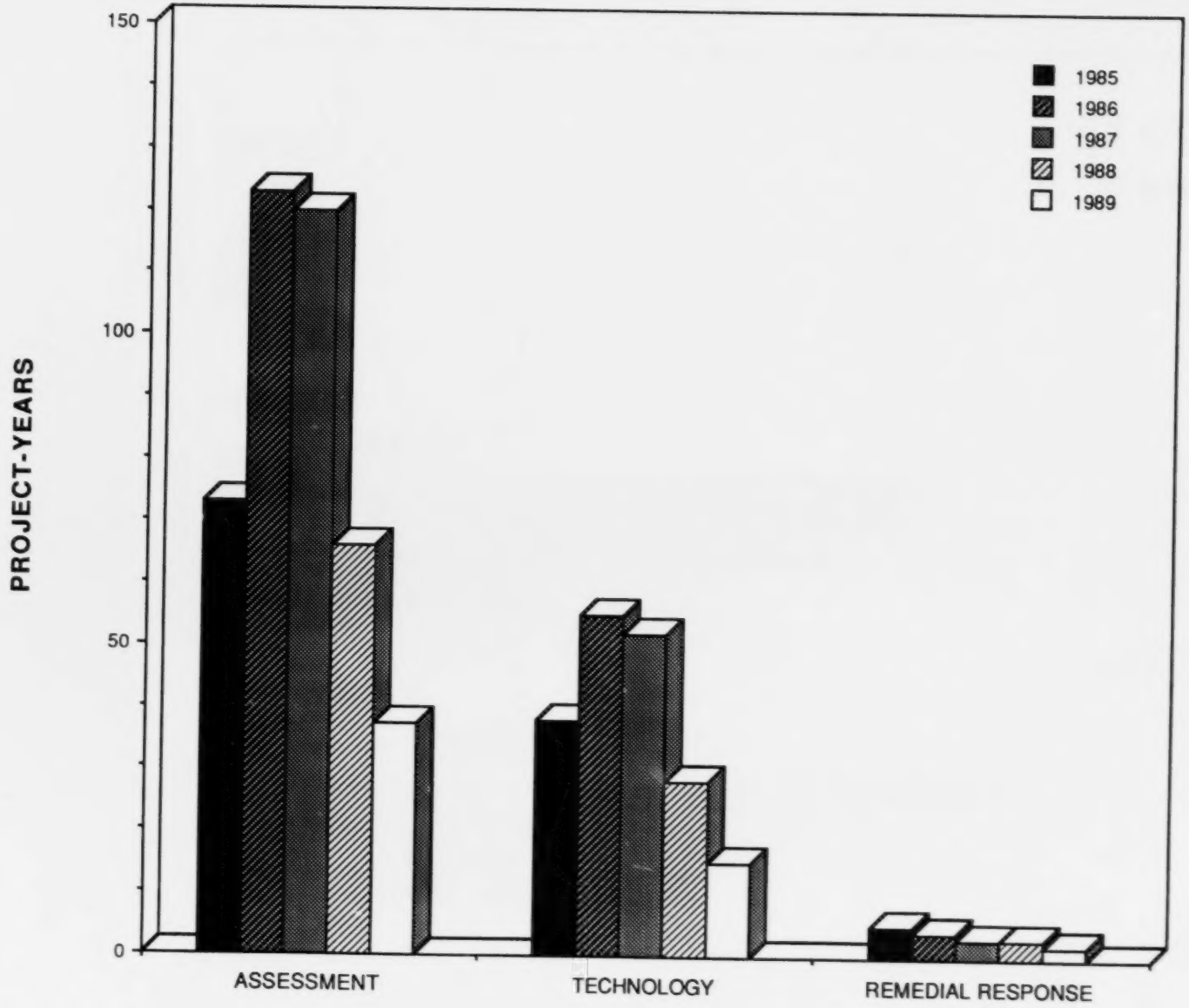

FIGURE 4. TOTAL PROJECT-YEARS, BY WORK GROUP

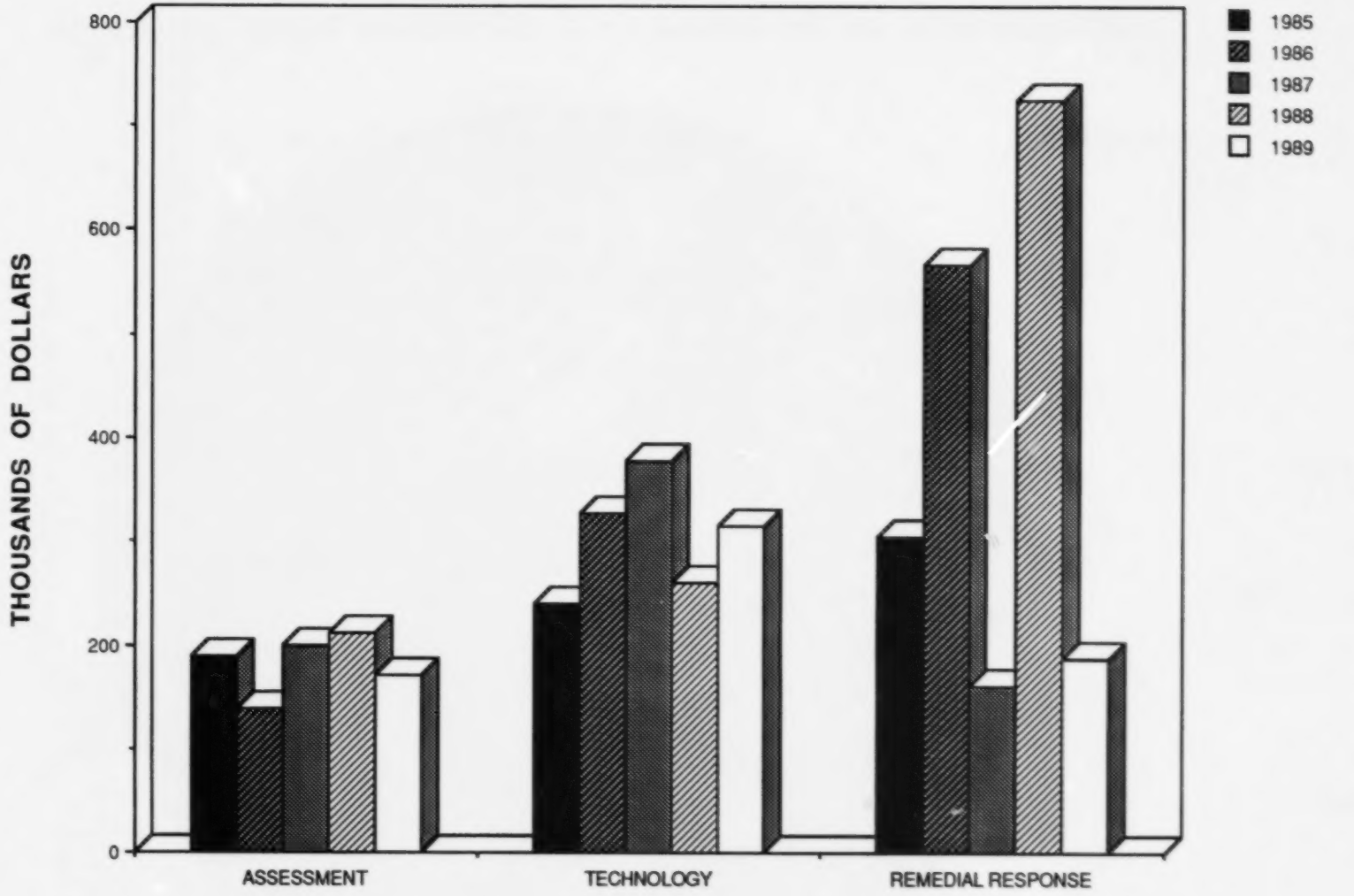

FIGURE 5. AVERAGE COST/PROJECT/YEAR

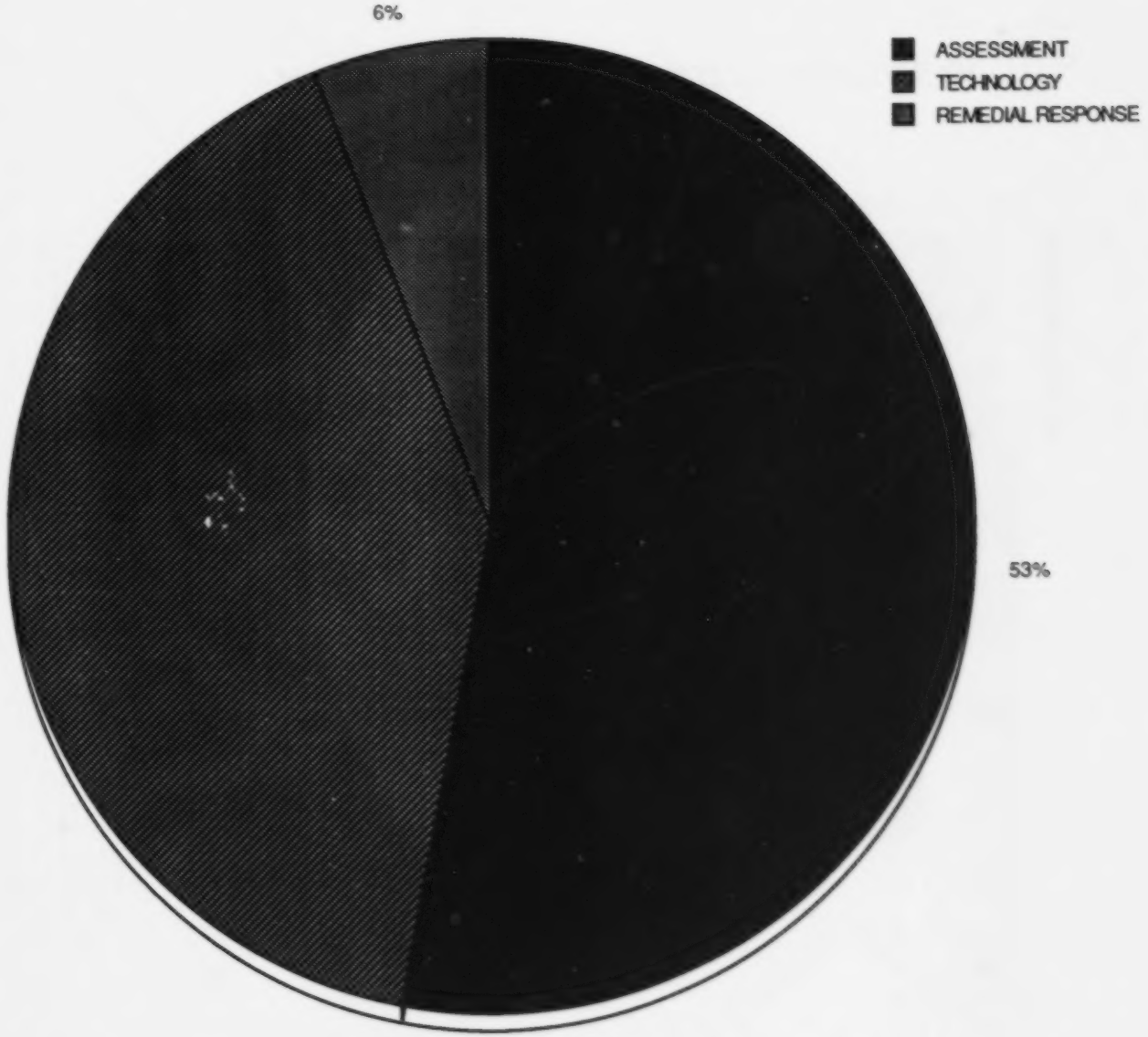

FIGURE 6. TOTAL FUNDING (5 YEAR PROGRAM), BY WORK GROUP (≈142.4 MILLION DOLLARS)

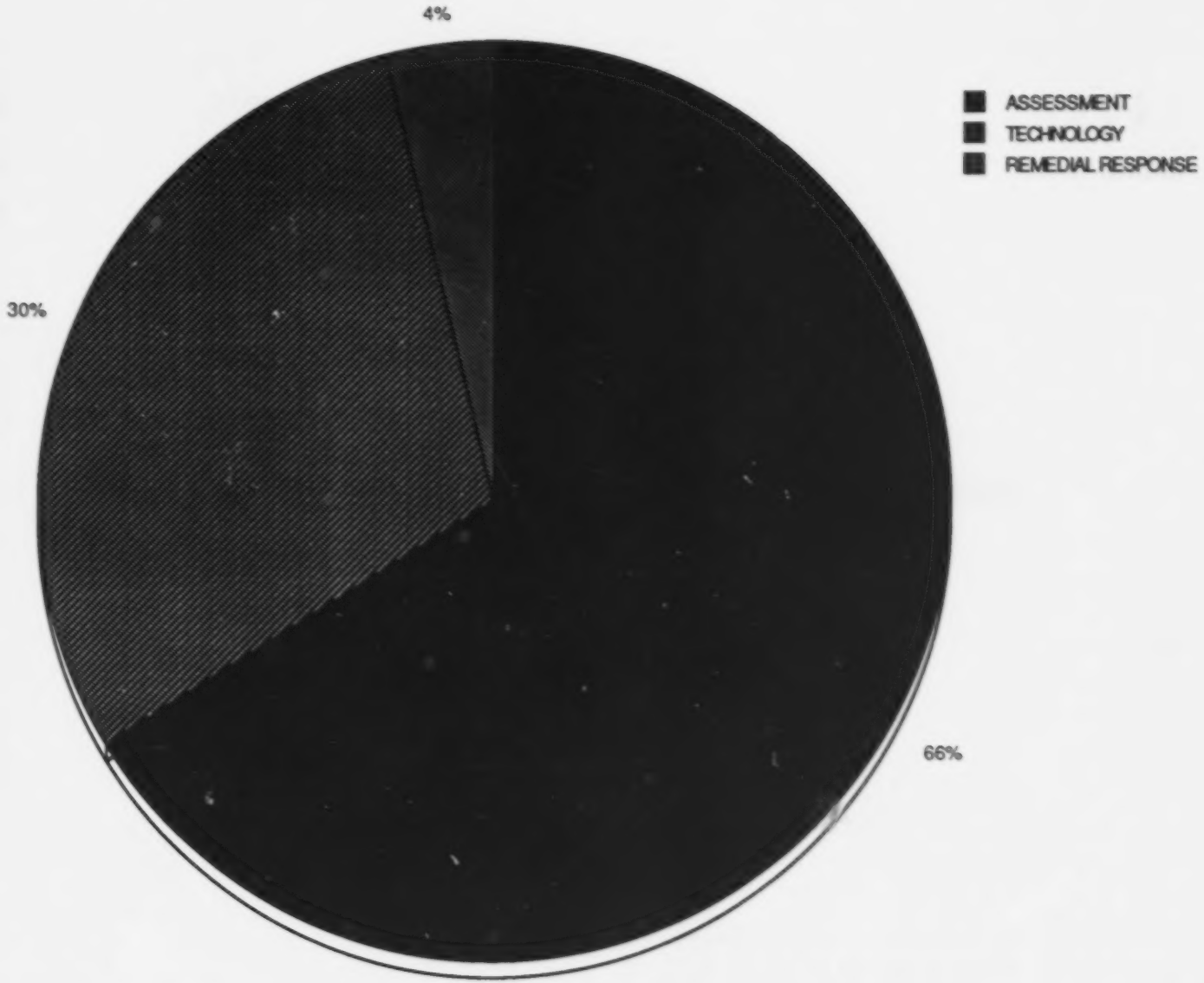

FIGURE 7. TOTAL PROJECT-YEARS (628)

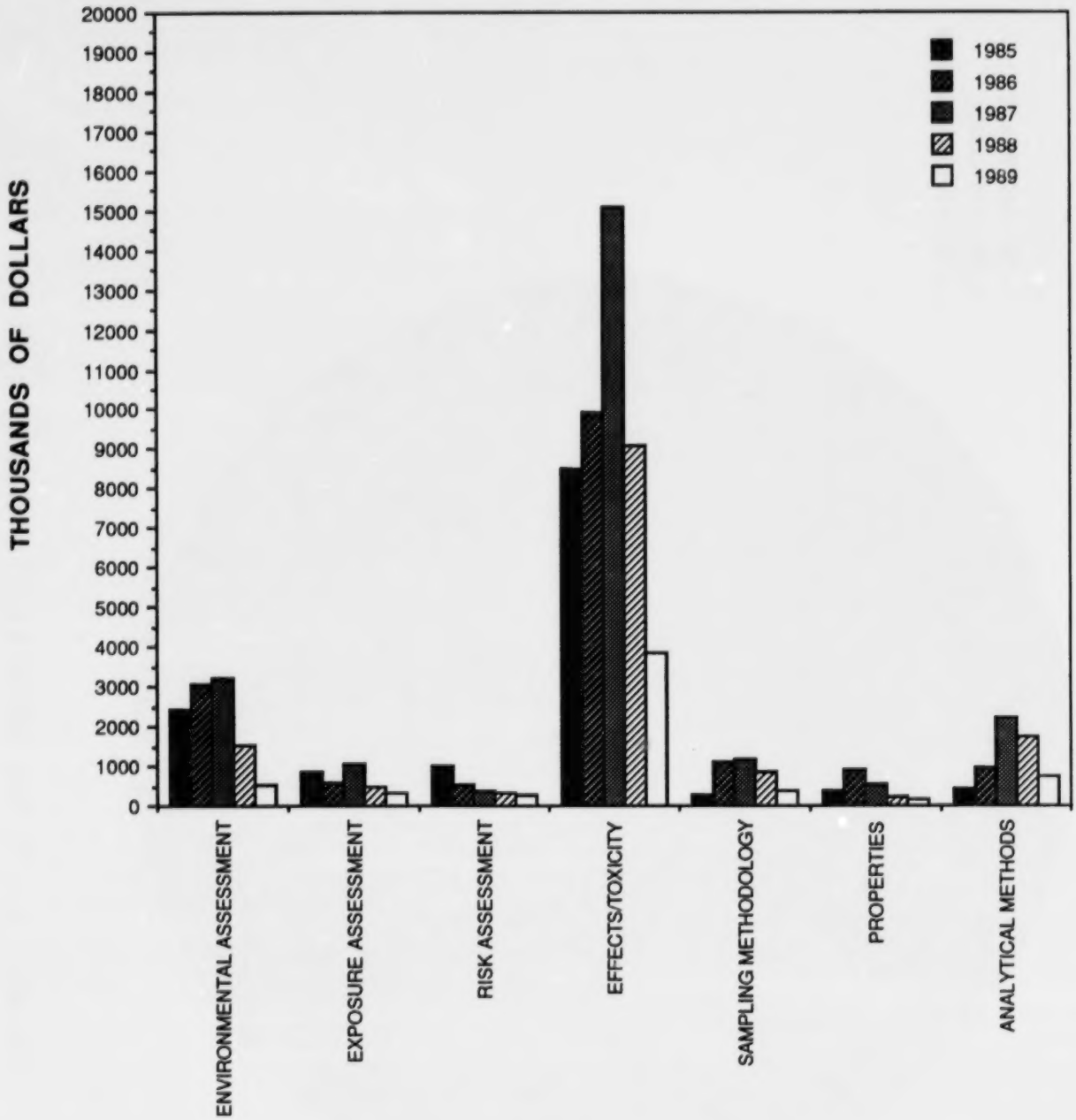

FIGURE 8. WORKING GROUP A - TOTAL FUNDING, BY YEAR

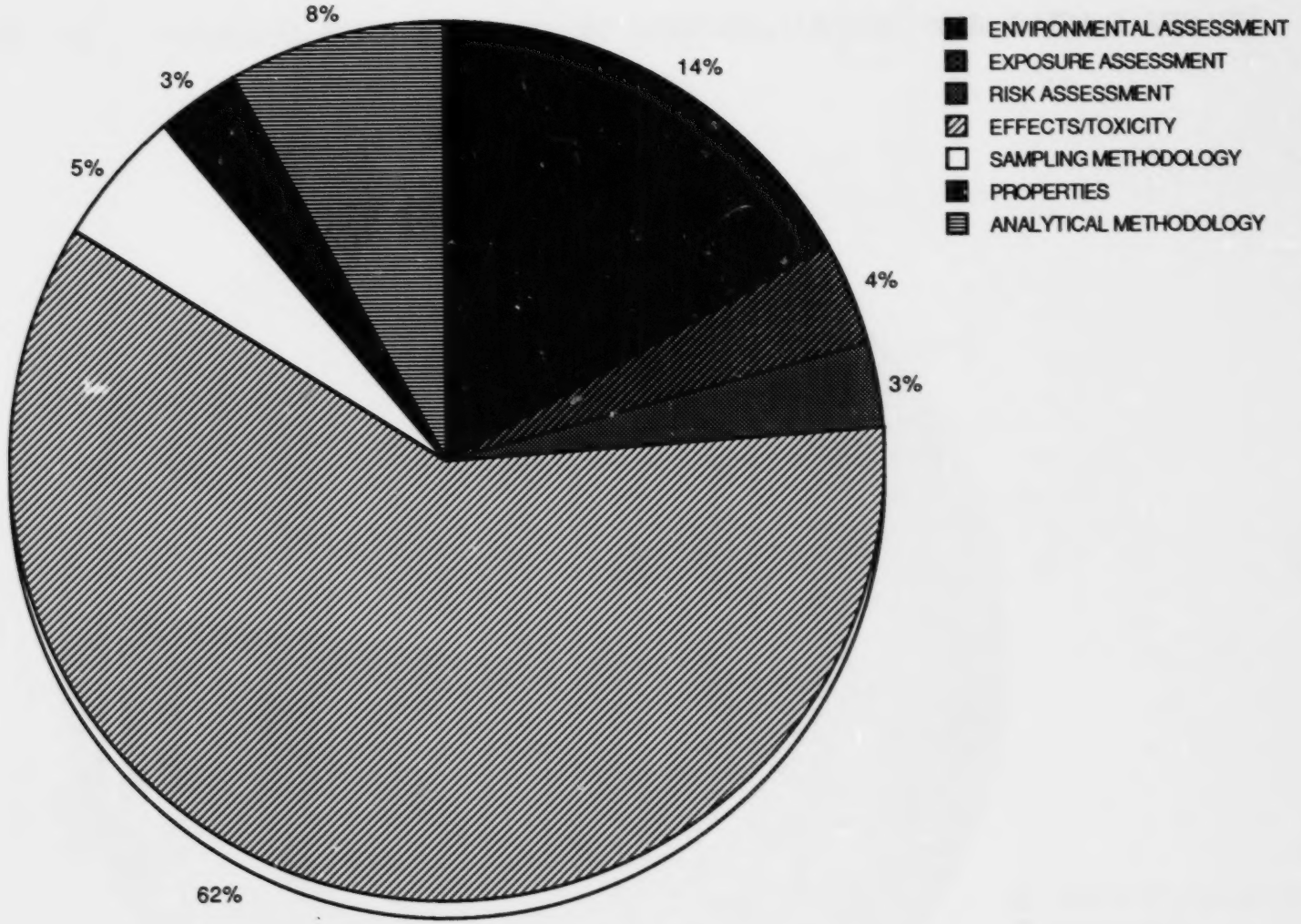

FIGURE 9. WORKING GROUP A - TOTAL FUNDING OVER 5-YEARS (≈75.1 MILLION DOLLARS)

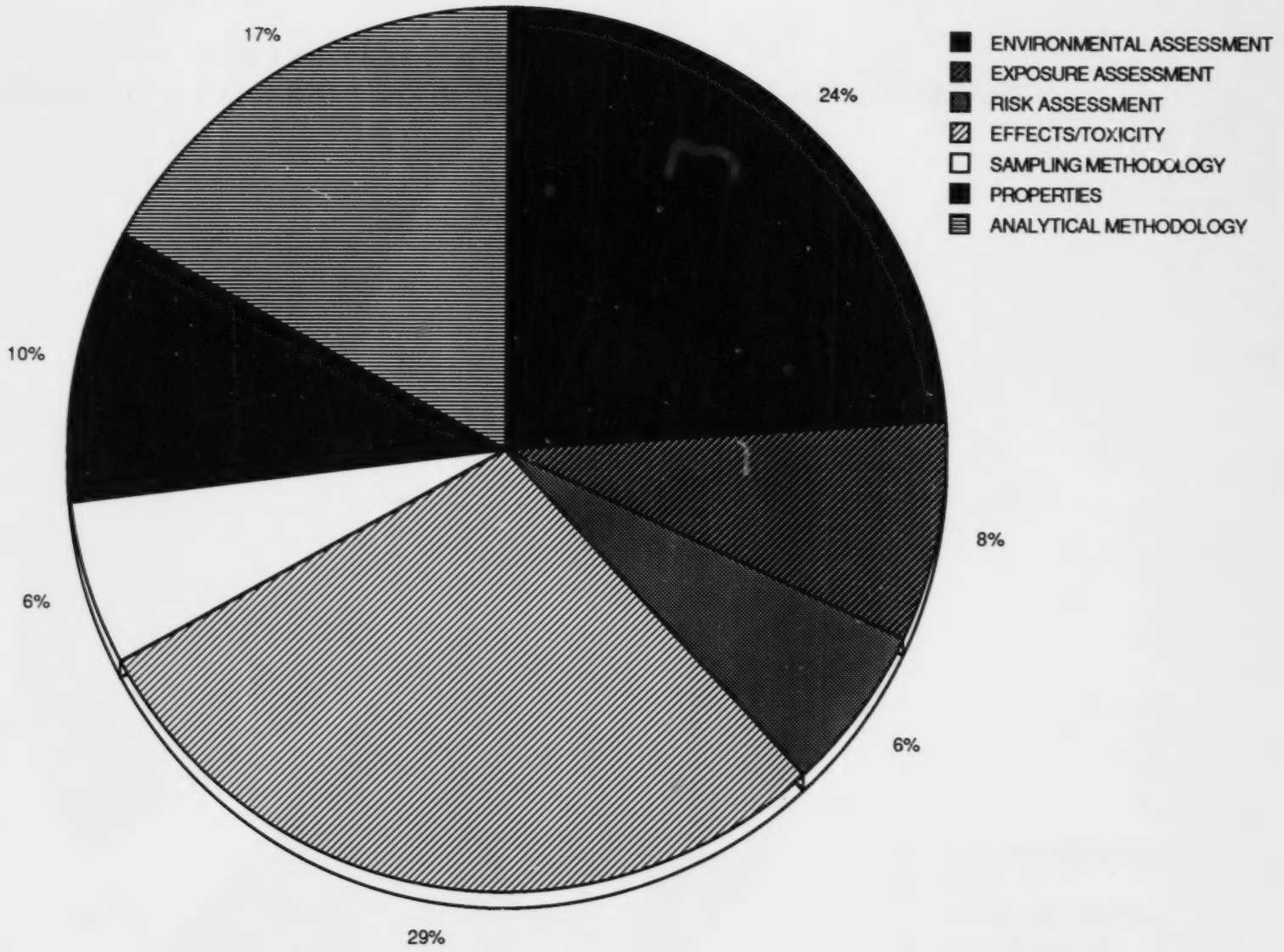

FIGURE 10. WORKING GROUP A - TOTAL PROJECT-YEARS, (419 OVER 5 YEARS)

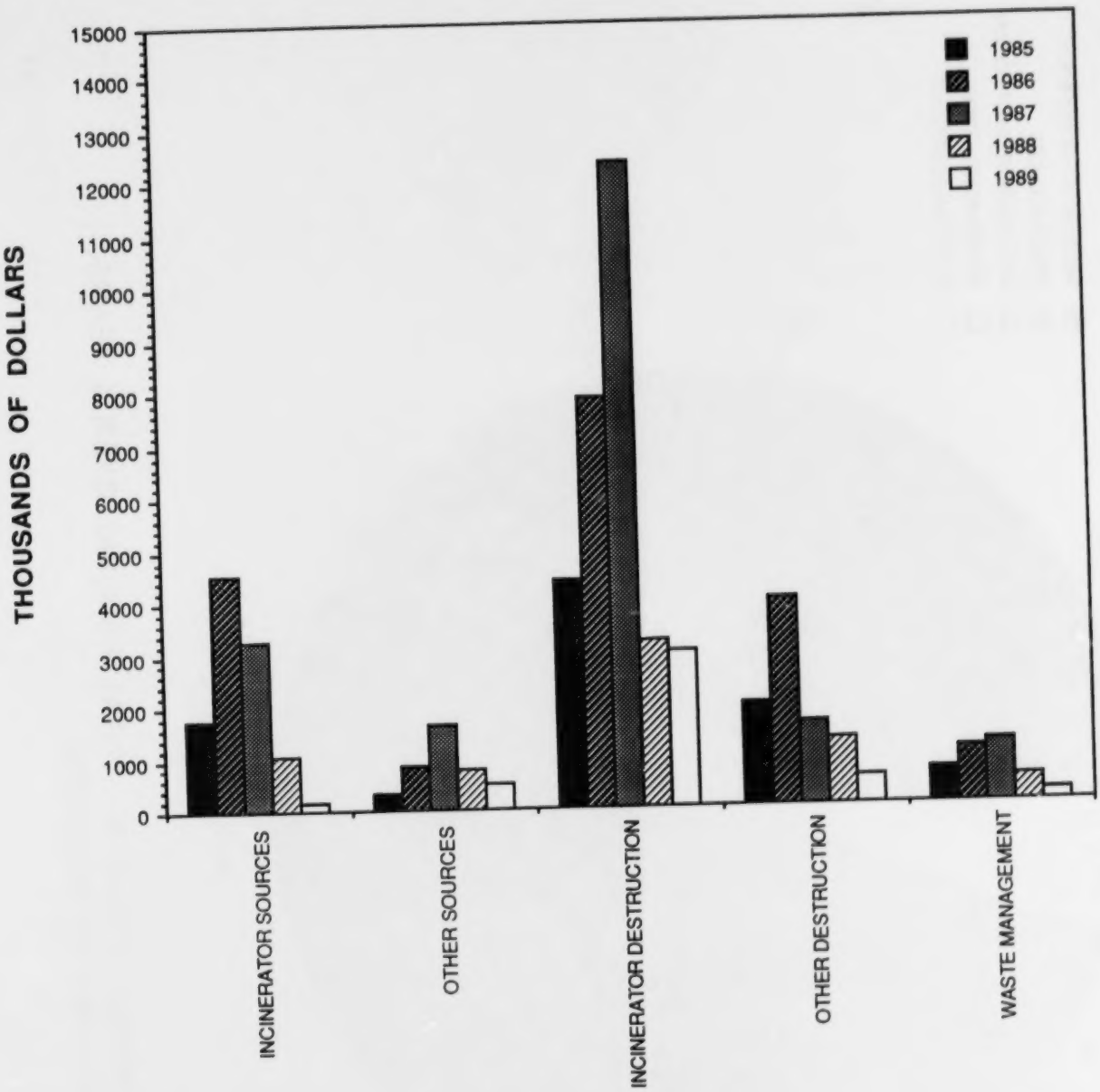

FIGURE 11. WORKING GROUP B - TOTAL FUNDING, BY YEAR

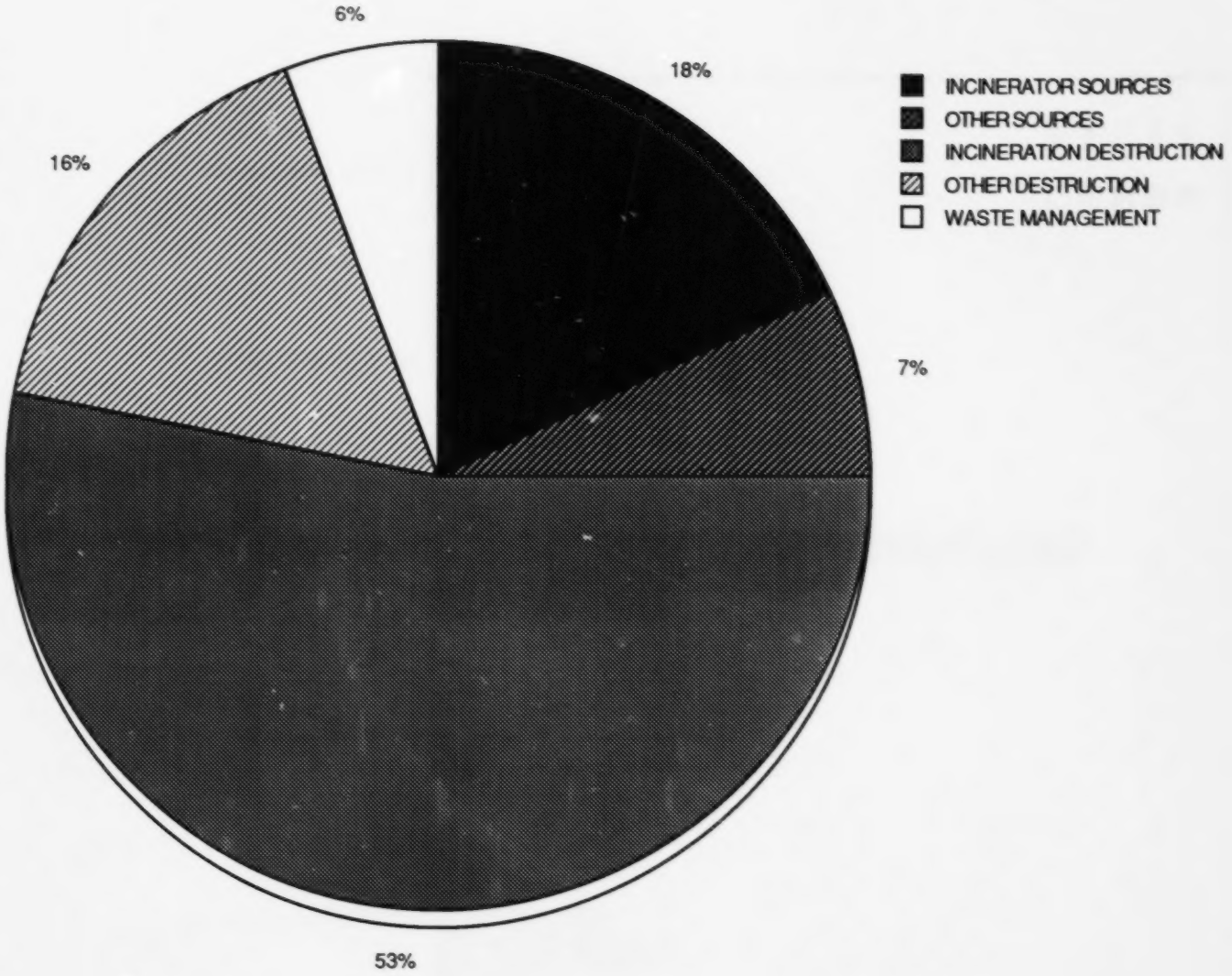

FIGURE 12. WORKING GROUP B - TOTAL FUNDING OVER 5 YEARS, (≈58.6 MILLION DOLLARS)

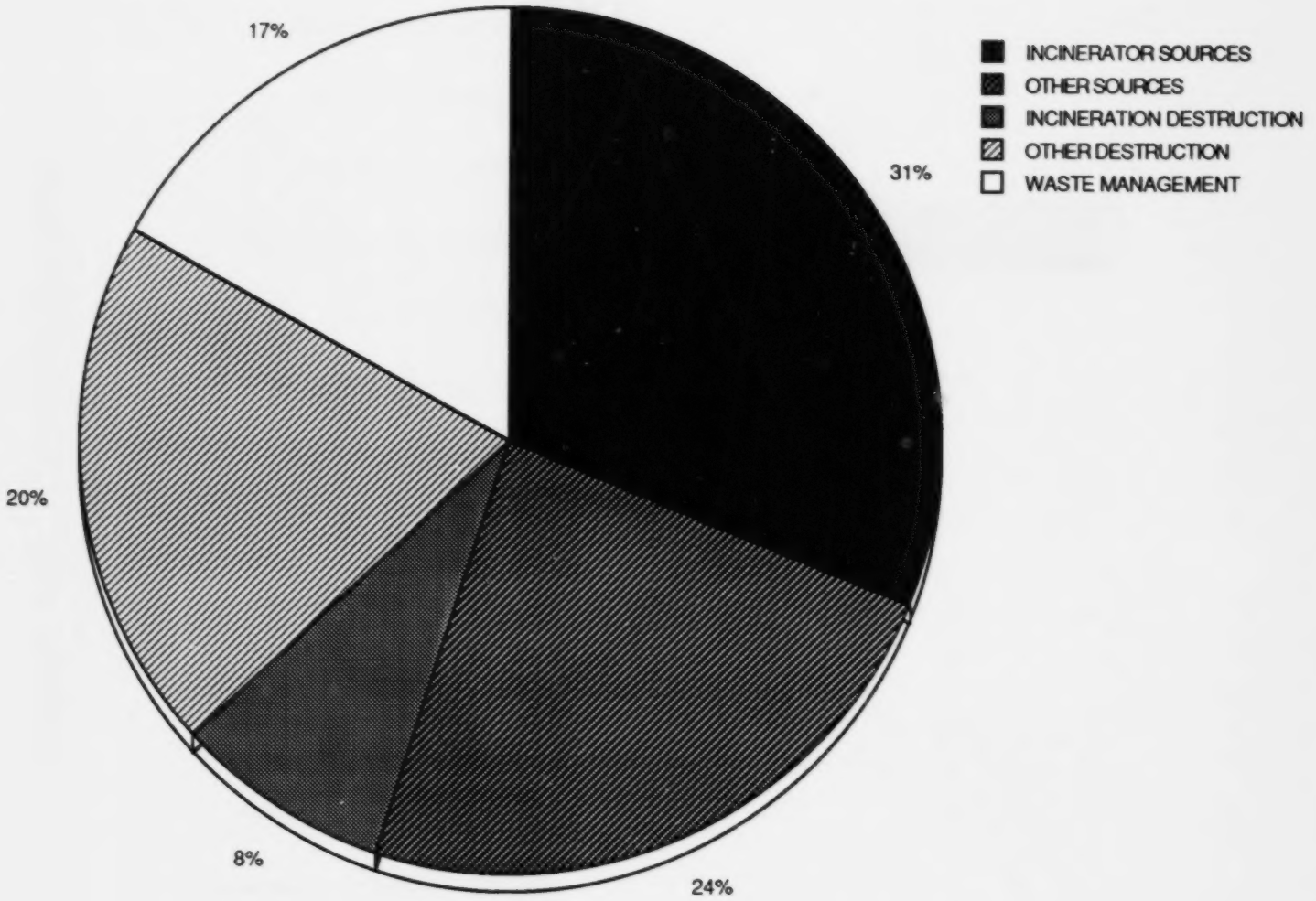

FIGURE 13. WORKING GROUP B - TOTAL PROJECT-YEARS, (186 OVER 5 YEARS)

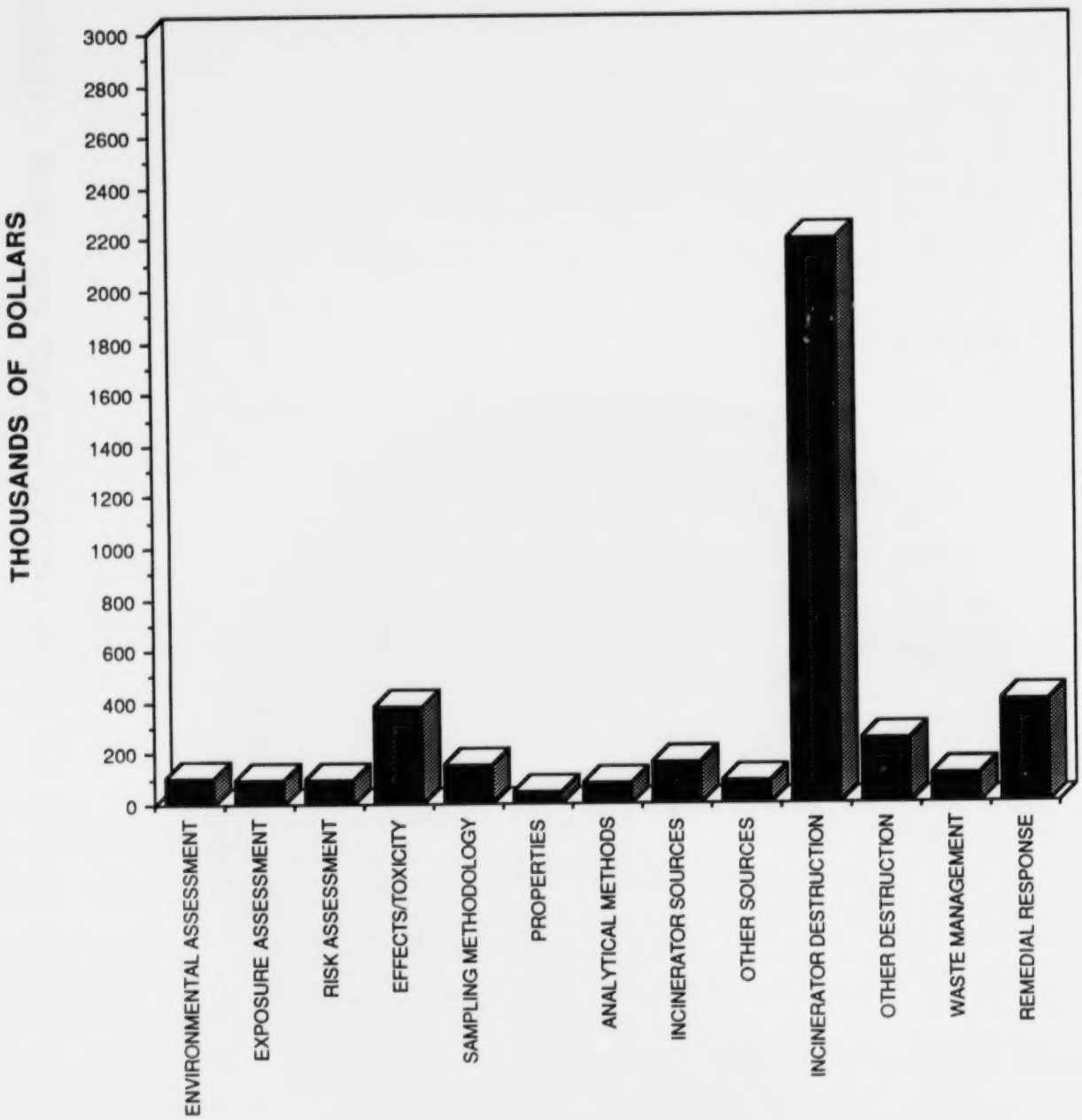

FIGURE 14. COST/PROJECT-YEAR

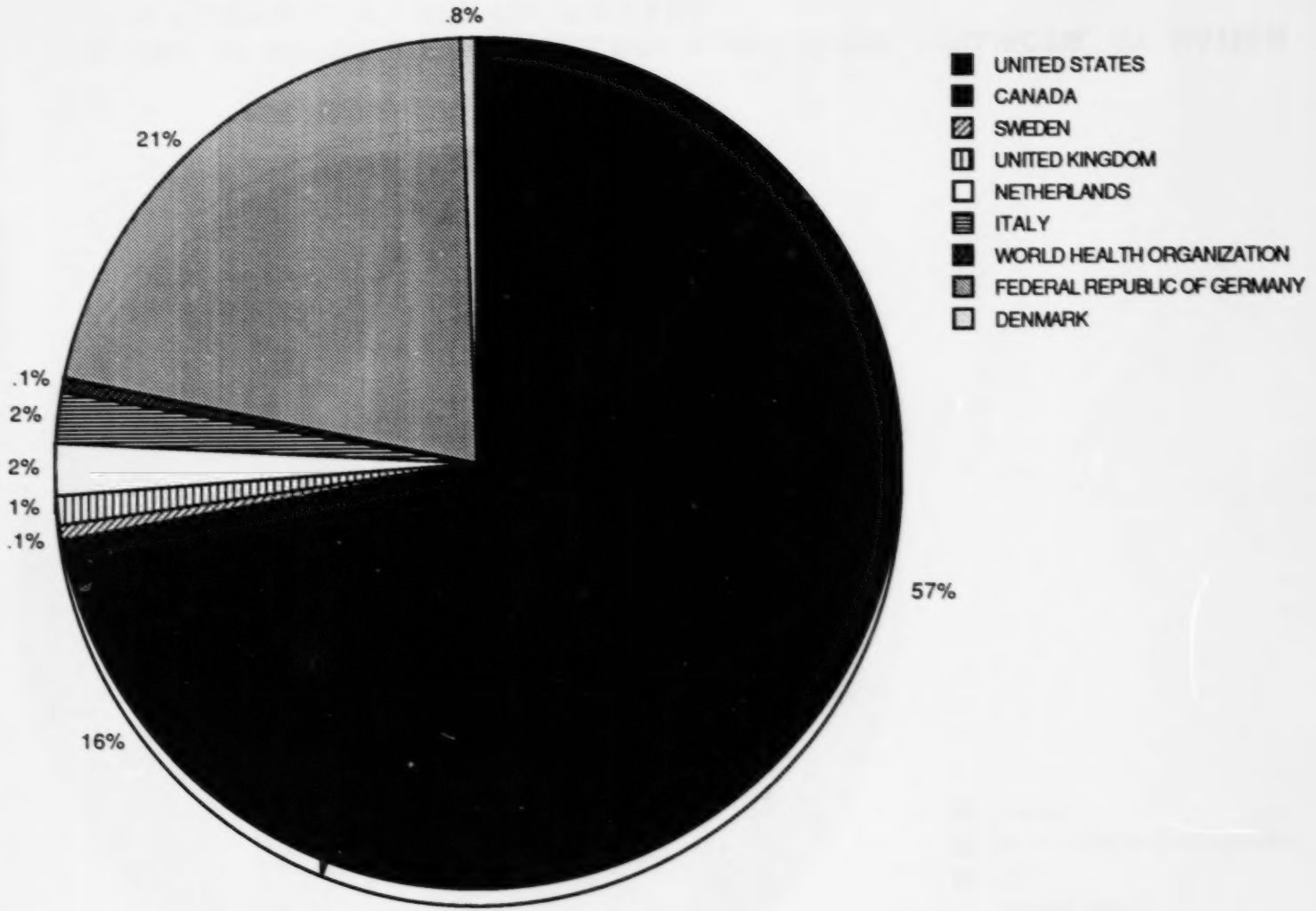

FIGURE 15. TOTAL FUNDING, BY NATION (TOTAL FUNDING = 142.4 MILLION DOLLARS)

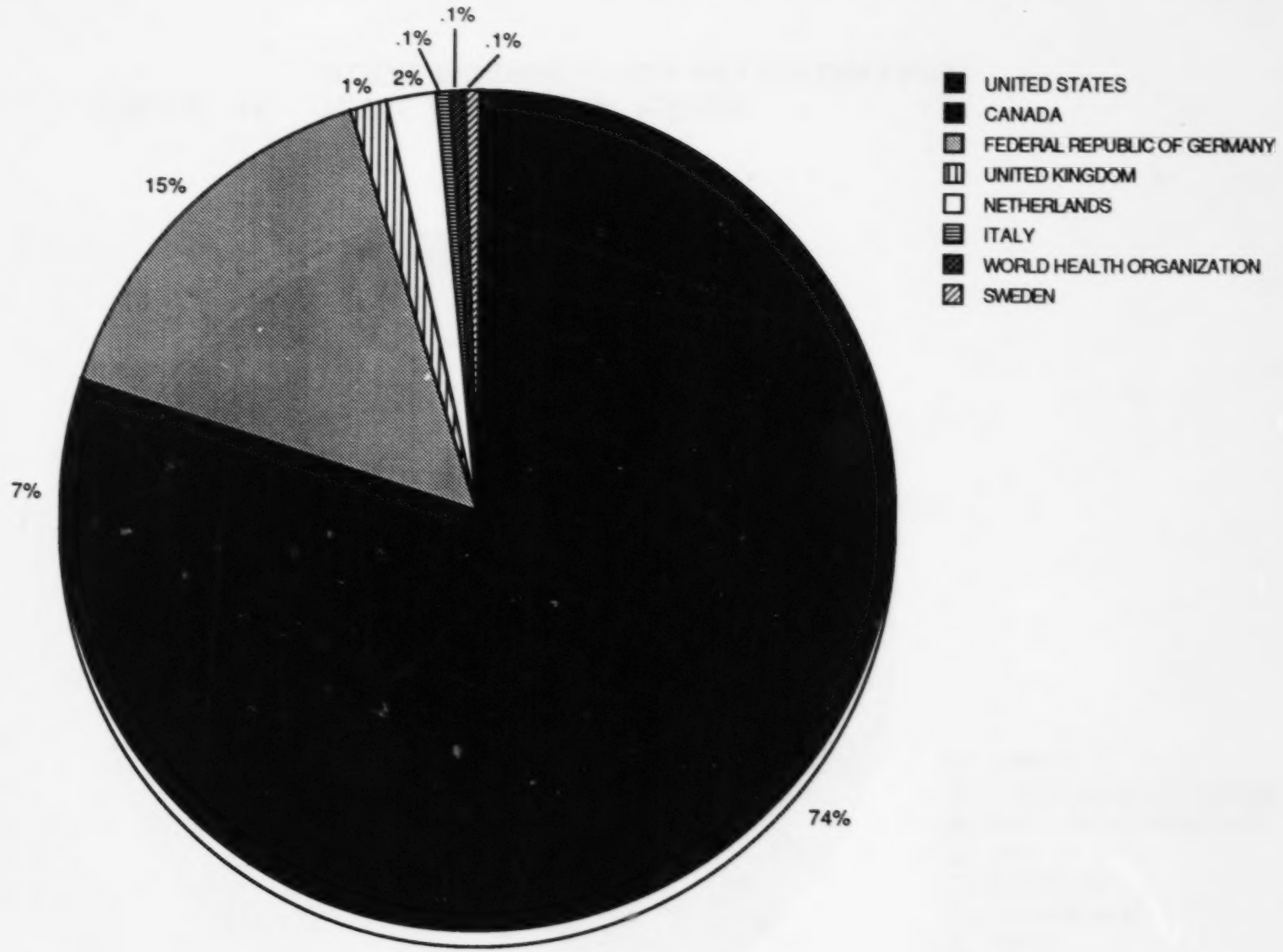

FIGURE 16. FUNDING OF EXPOSURE AND HAZARD ASSESSMENT PROJECTS, BY NATION (TOTAL FUNDING = 75.1 MILLION DOLLARS)

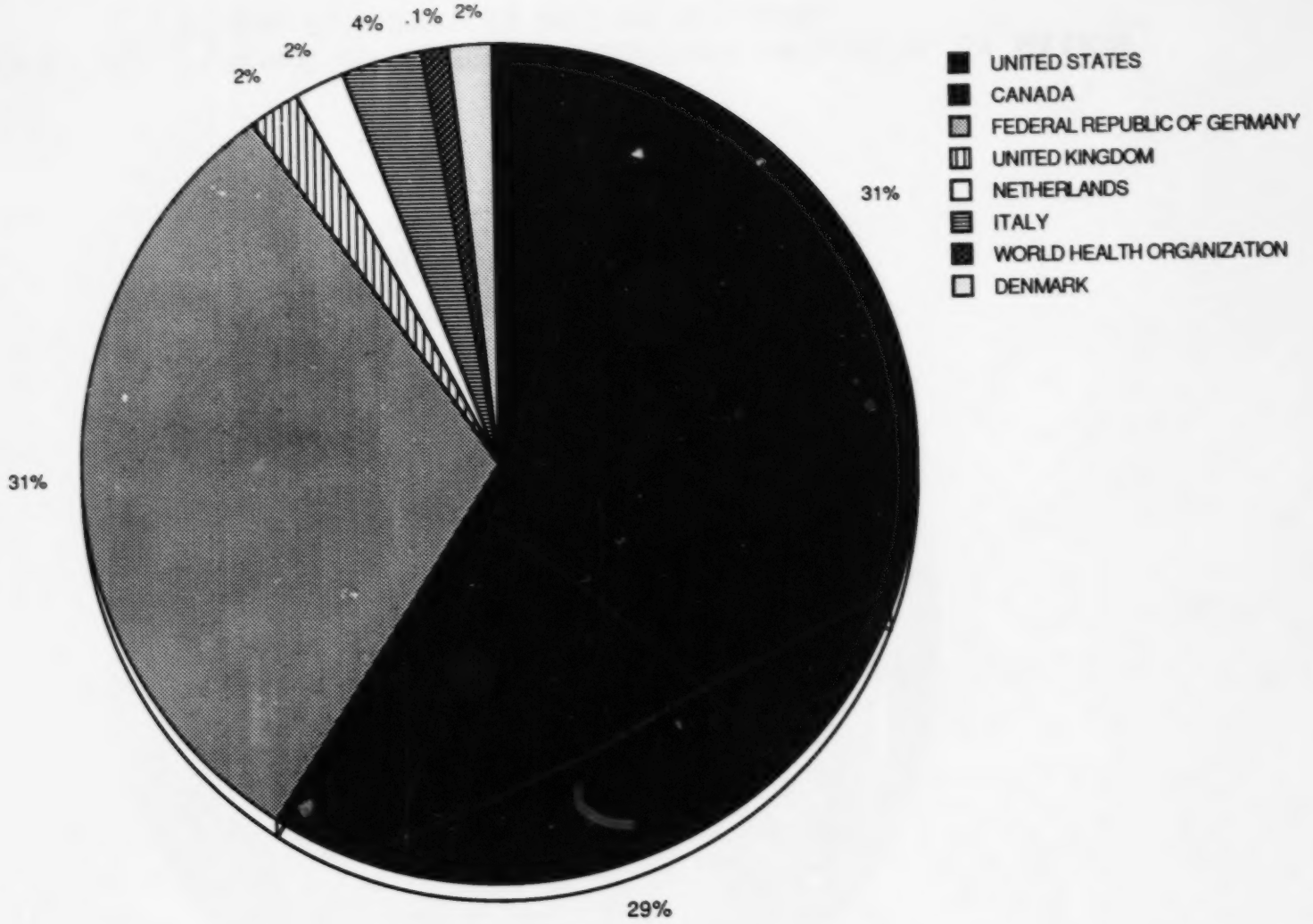

FIGURE 17. FUNDING OF TECHNOLOGY ASSESSMENT PROJECTS, BY NATION (TOTAL FUNDING = 58.6 MILLION DOLLARS)

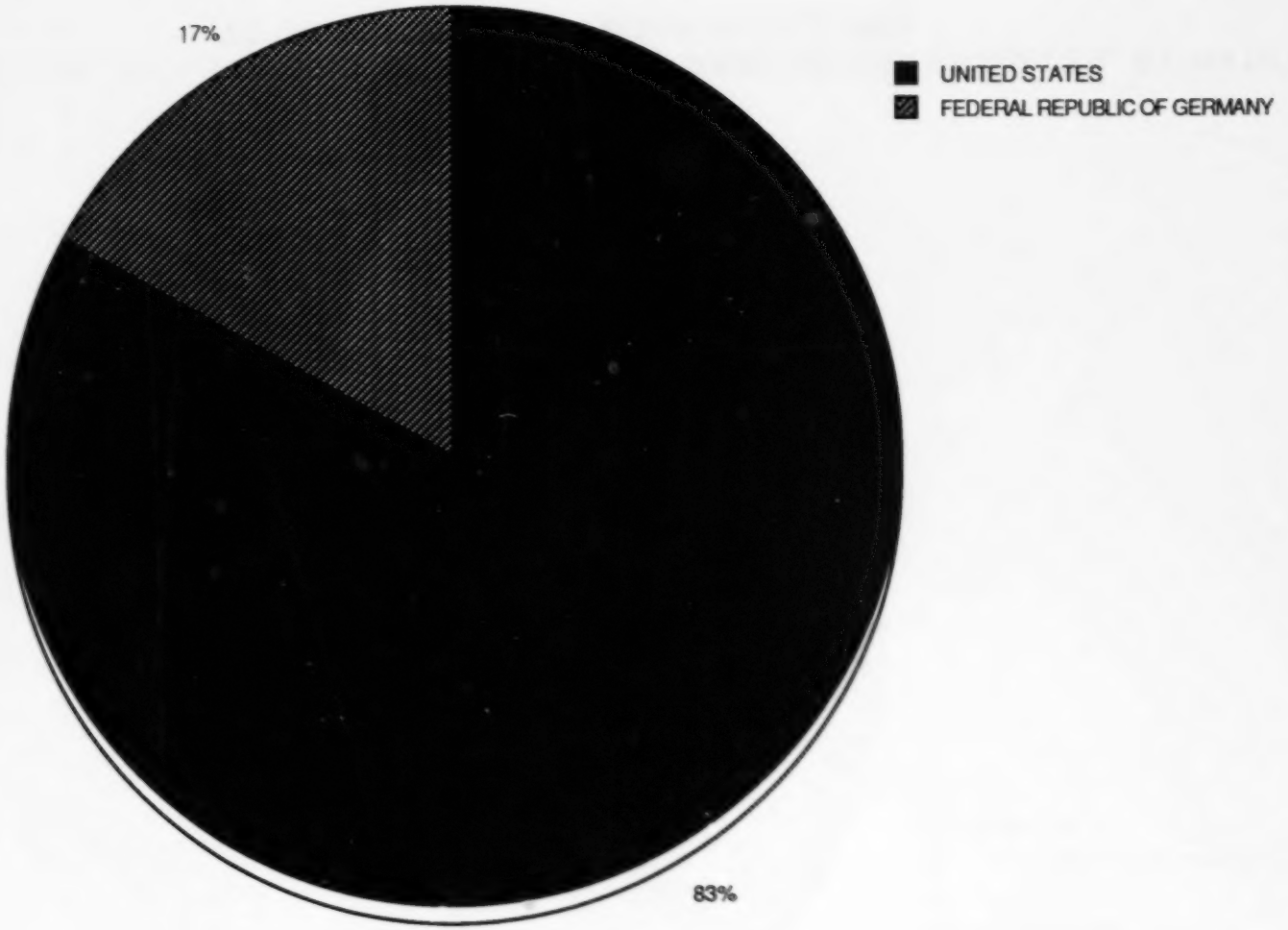

FIGURE 18. FUNDING OF REMEDIAL RESPONSE PROJECTS, BY NATION (TOTAL FUNDING = 8.8 MILLION DOLLARS)

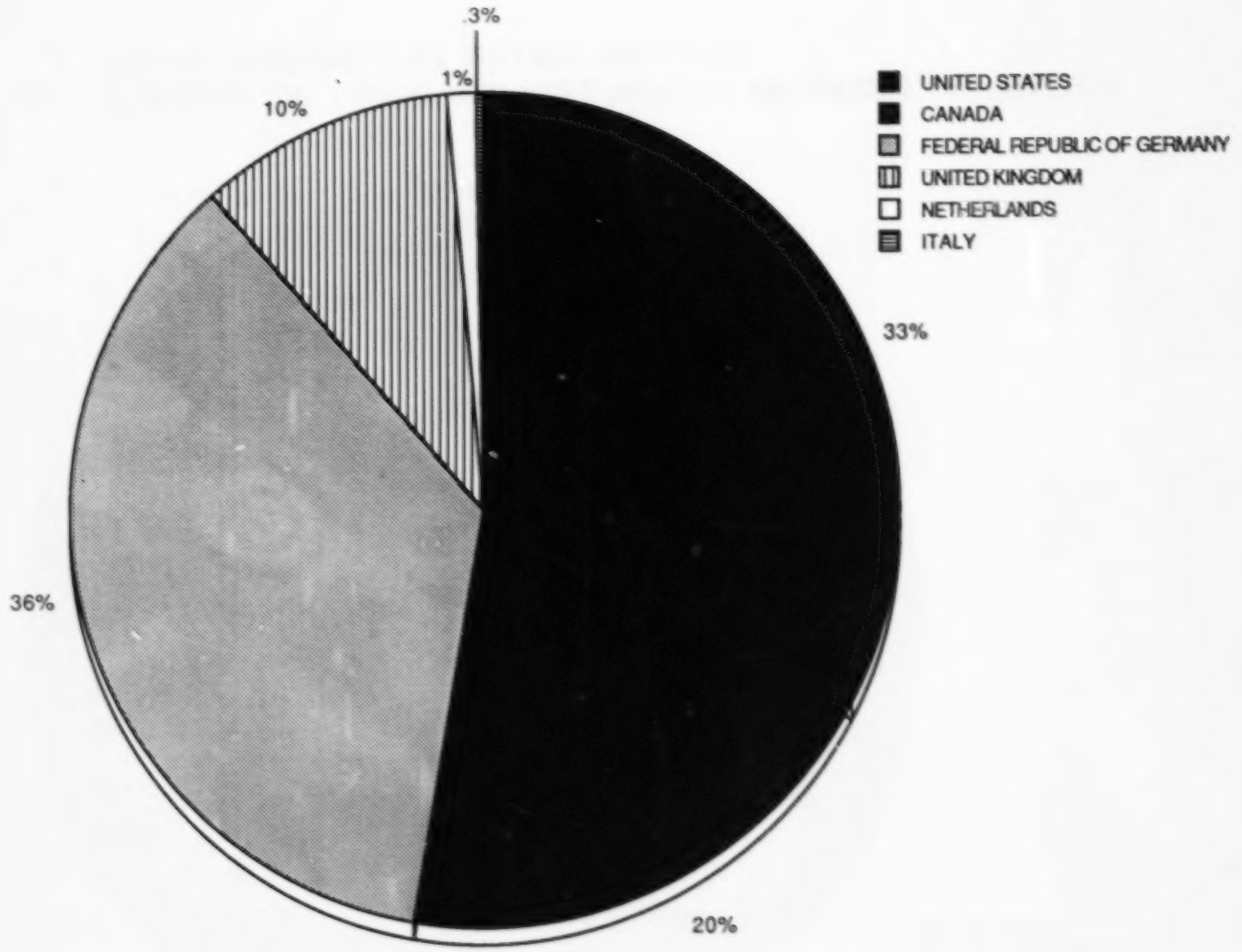

FIGURE 19. FUNDING OF ENVIRONMENTAL ASSESSMENT PROJECTS, BY NATION (TOTAL FUNDING = 10.7 MILLION DOLLARS)

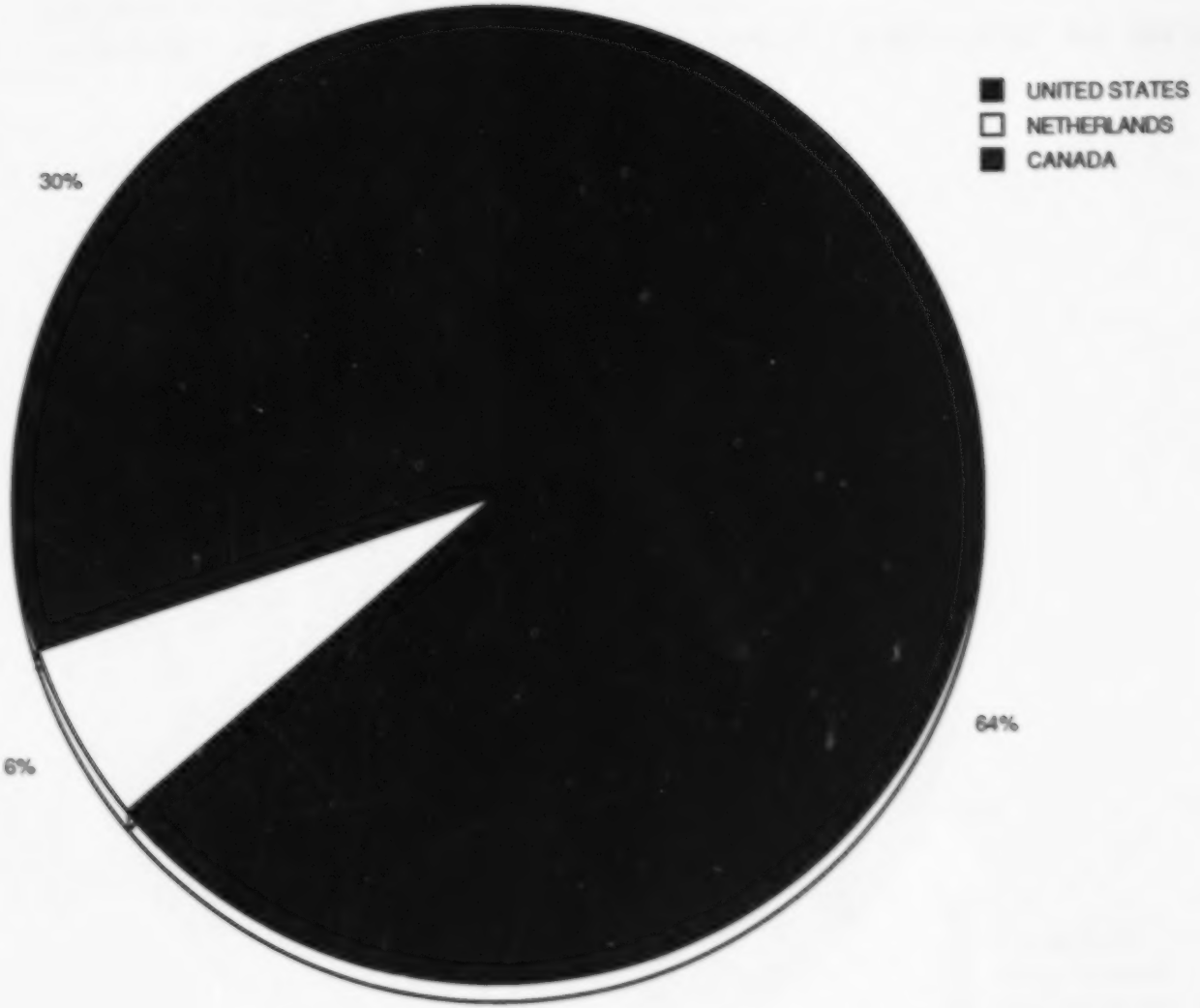

FIGURE 20. FUNDING OF EXPOSURE ASSESSMENT PROJECTS, BY NATION (TOTAL FUNDING = 3.3 MILLION DOLLARS)

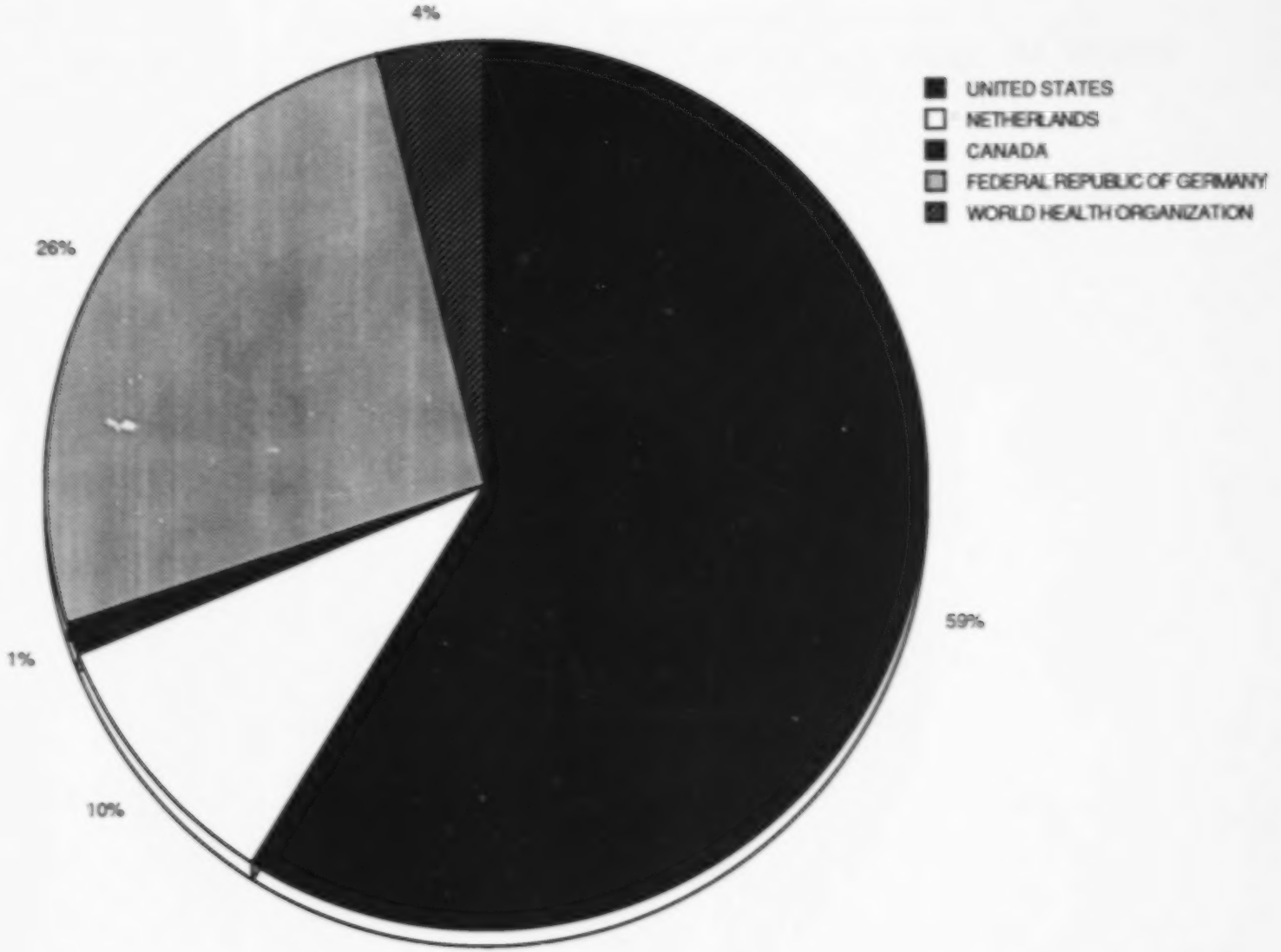

FIGURE 21. FUNDING OF RISK ASSESSMENT PROJECTS, BY NATION (TOTAL FUNDING = 2.5 MILLION)

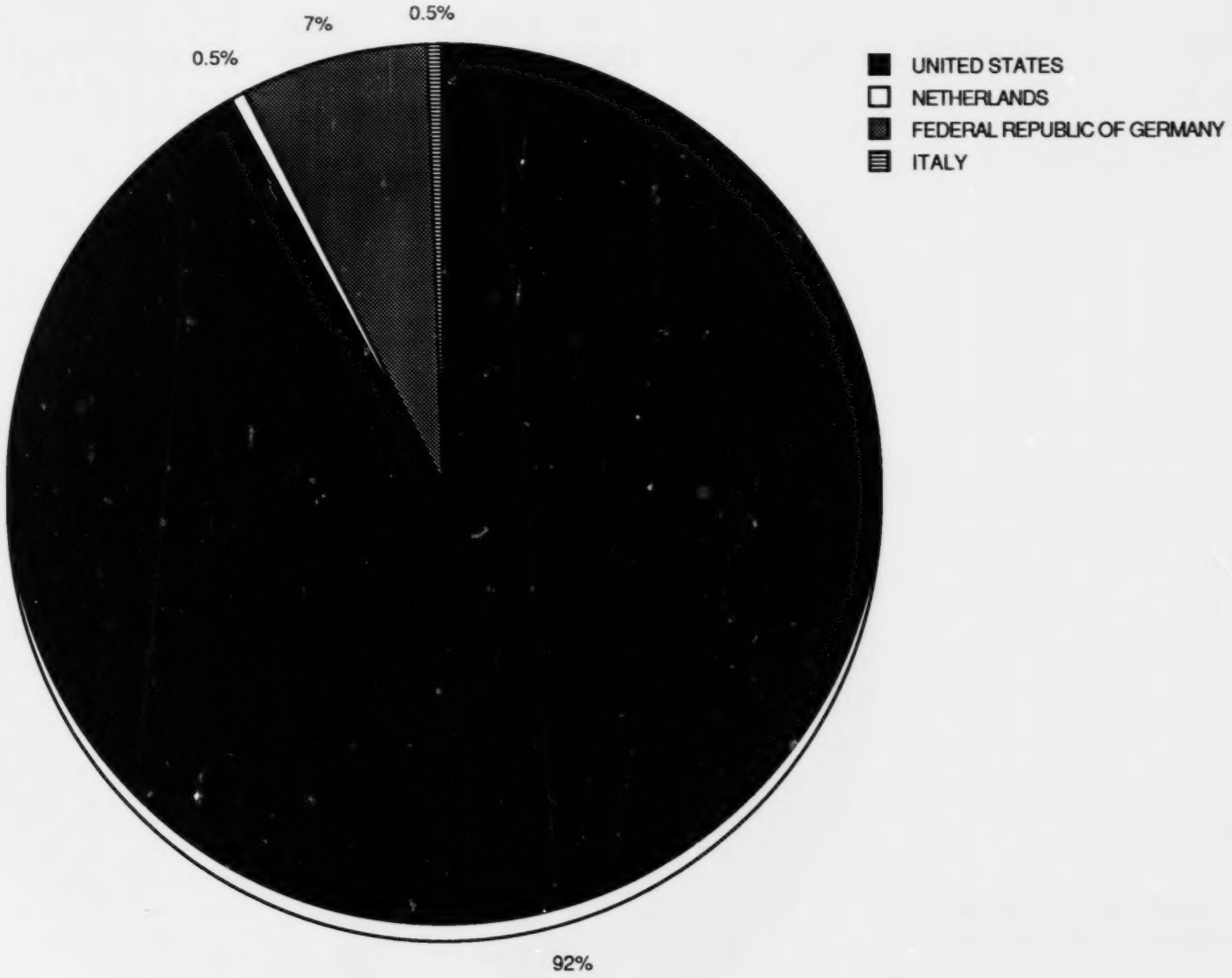

FIGURE 22. FUNDING OF EFFECTS/TOXICITY PROJECTS, BY NATION (TOTAL FUNDING = 46.5 MILLION DOLLARS)

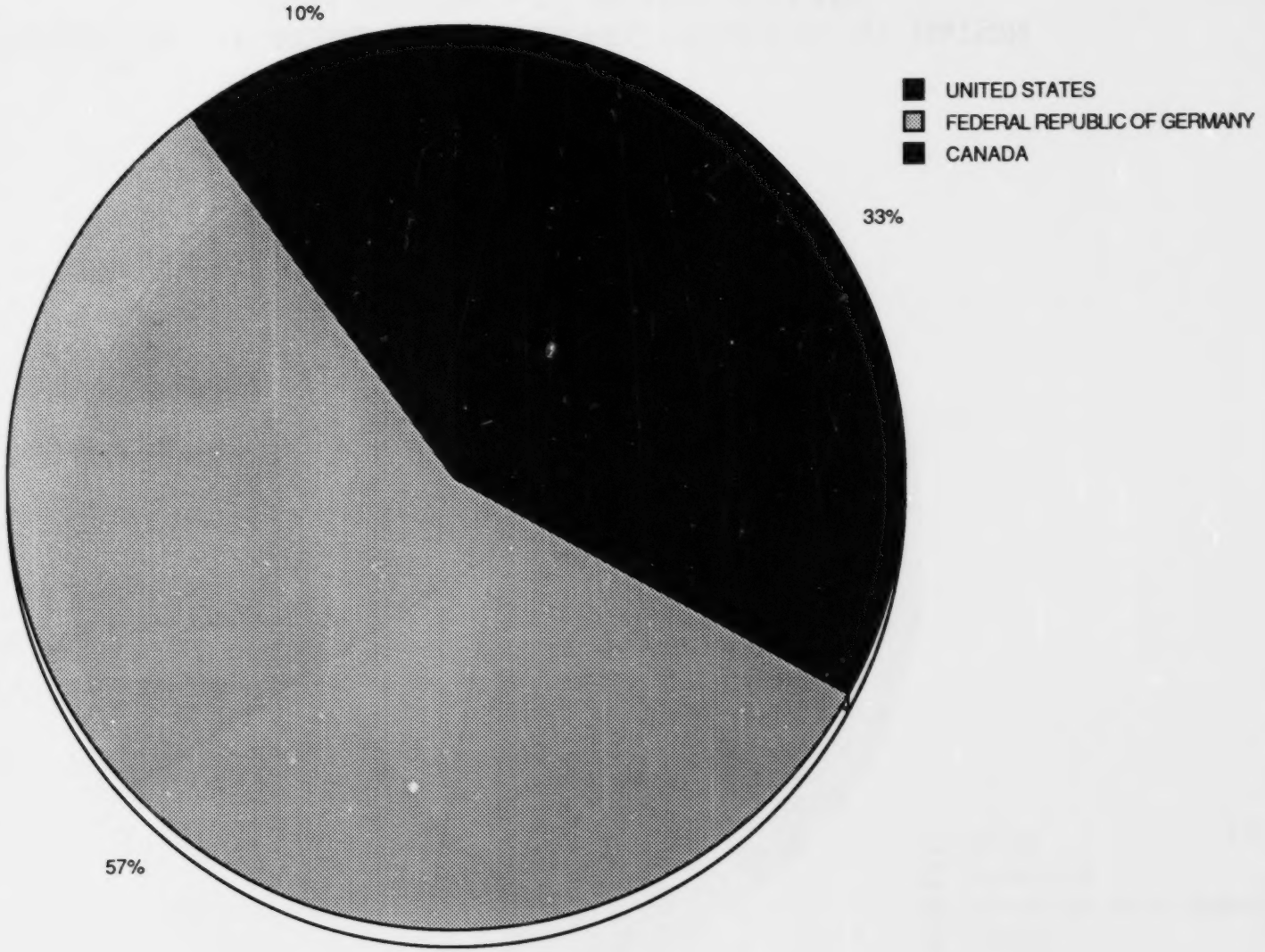

FIGURE 23. FUNDING OF SAMPLING METHODOLOGY PROJECTS, BY NATION (TOTAL FUNDING = 3.8 MILLION DOLLARS)

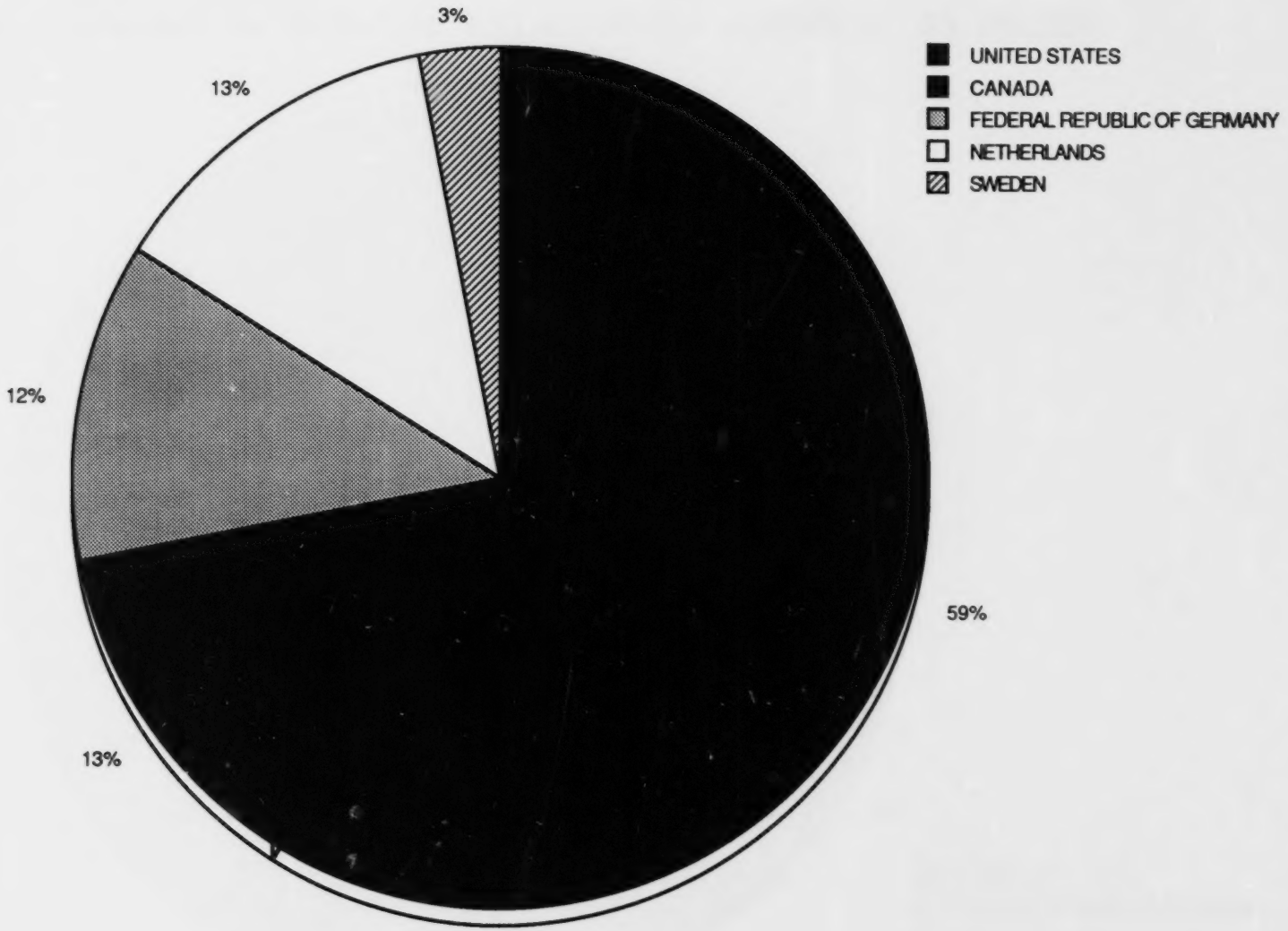

FIGURE 24. FUNDING OF PROPERTIES PROJECTS, BY NATION (TOTAL FUNDING = 2.1 MILLION DOLLARS)

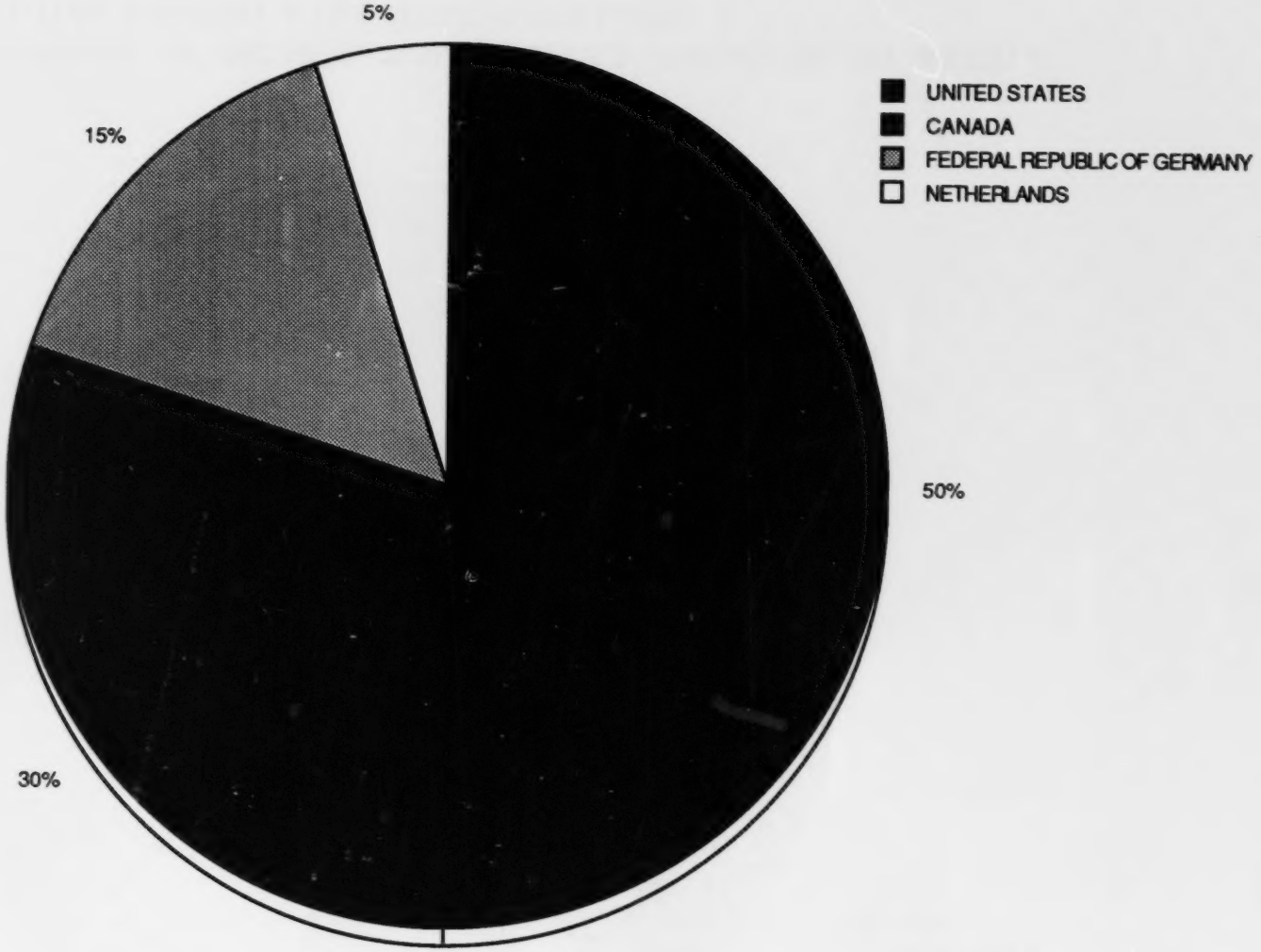

FIGURE 25. FUNDING OF ANALYTICAL METHODS PROJECTS, BY NATION (TOTAL FUNDING = 6.1 MILLION DOLLARS)

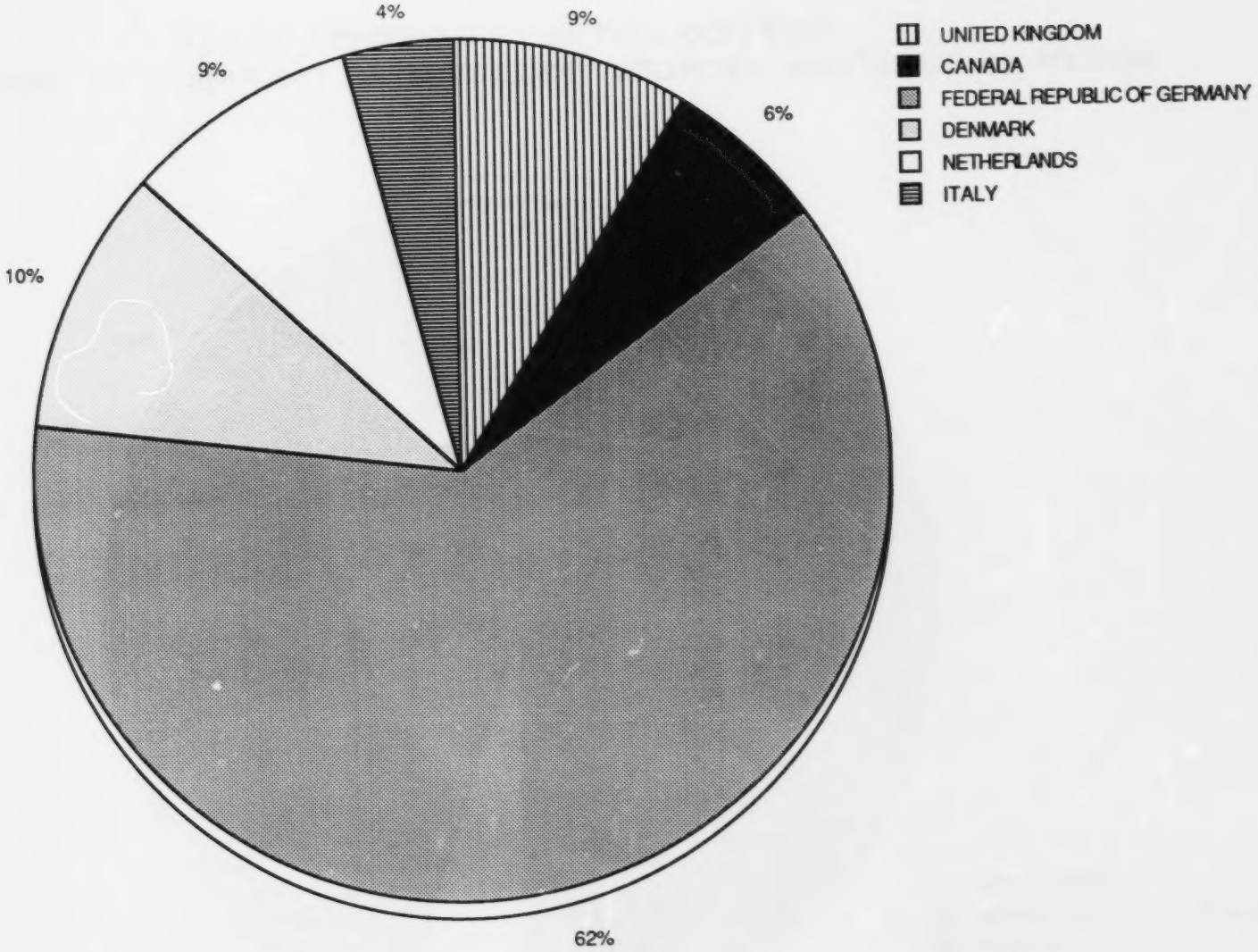

FIGURE 26. FUNDING OF INCINERATION SOURCES PROJECTS, BY NATION (TOTAL FUNDING = 10.8 MILLION DOLLARS)

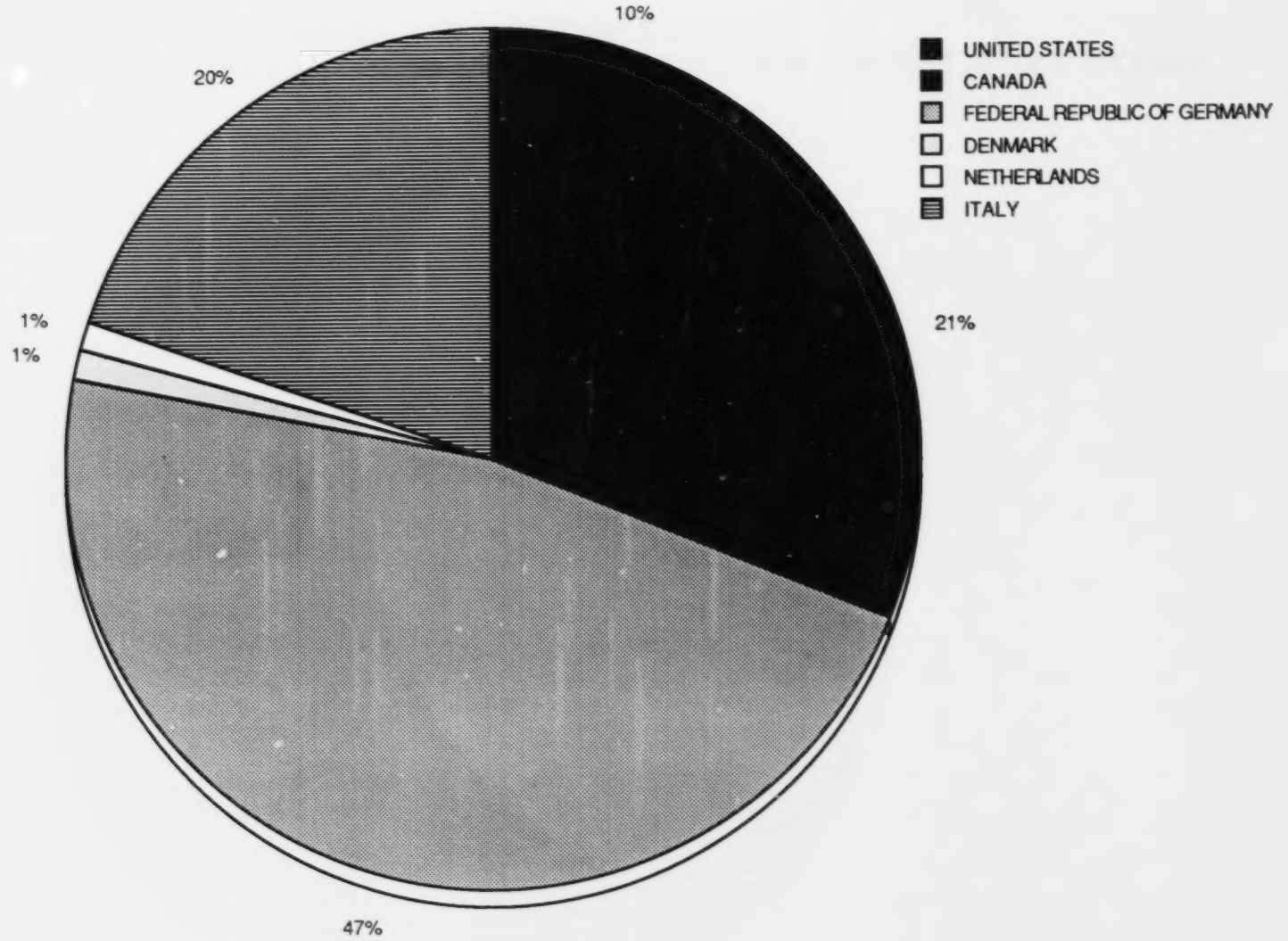

FIGURE 27. FUNDING OF OTHER SOURCES PROJECTS, BY NATION (TOTAL FUNDING = 4.1 MILLION DOLLARS)

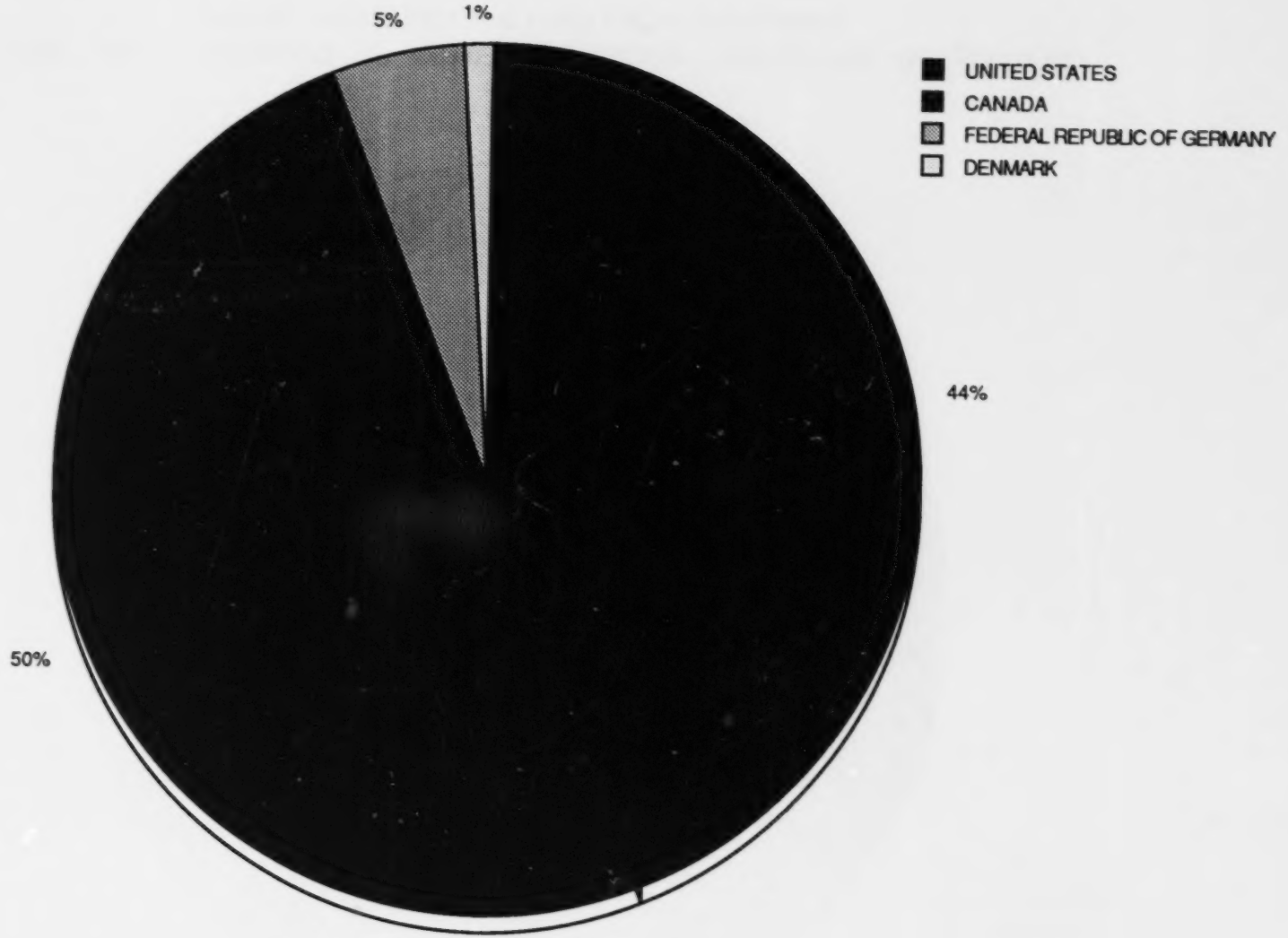

FIGURE 28. FUNDING OF INCINERATION DESTRUCTION PROJECTS, BY NATION (TOTAL FUNDING = 30.7 MILLION DOLLARS)

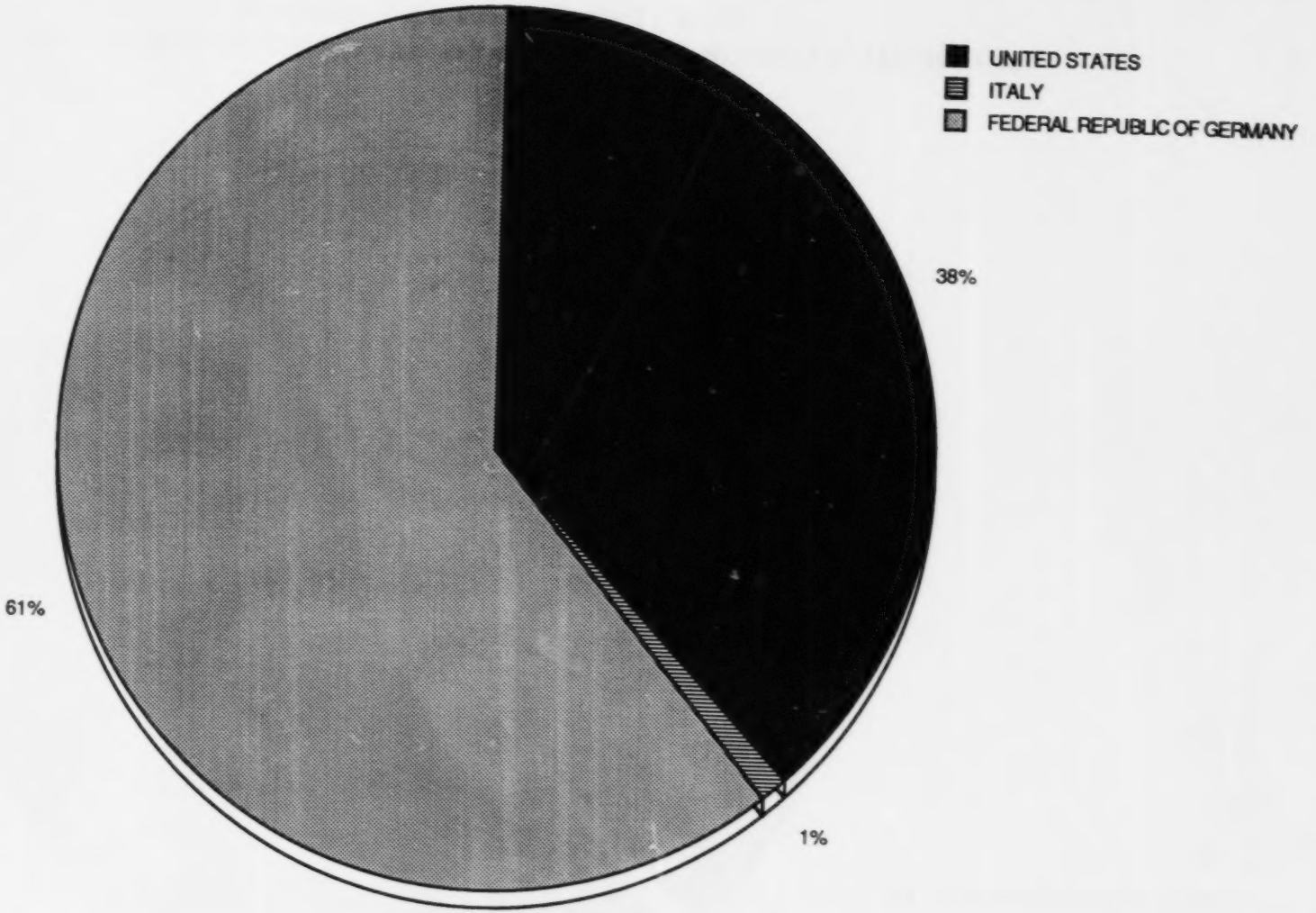

FIGURE 29. FUNDING OF OTHER DESTRUCTION METHODS, BY NATION (TOTAL FUNDING = 9.3 MILLION DOLLARS)

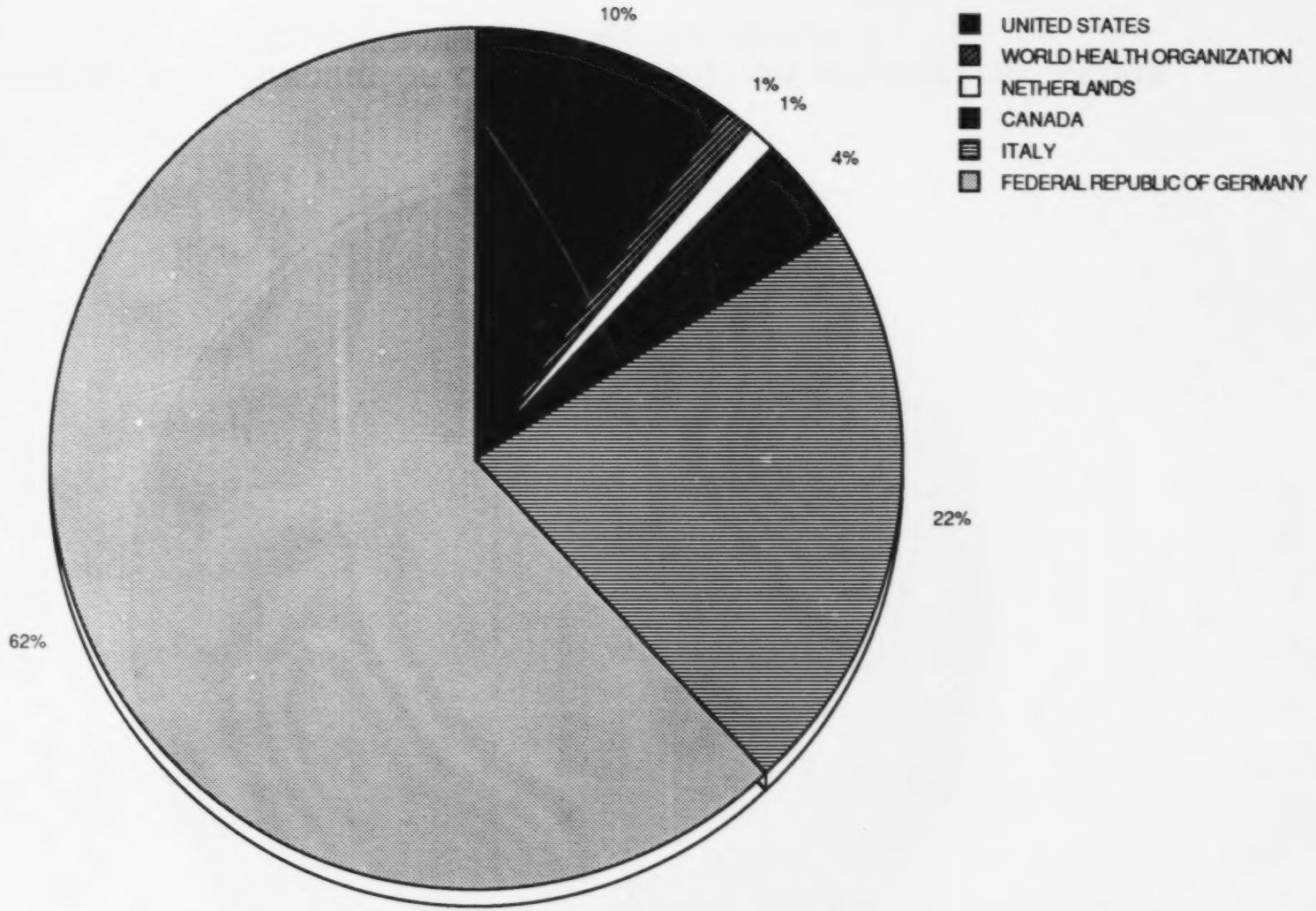

FIGURE 30. FUNDING OF WASTE MANAGEMENT PROJECTS, BY NATION (TOTAL FUNDING = 3.6 MILLION DOLLARS)

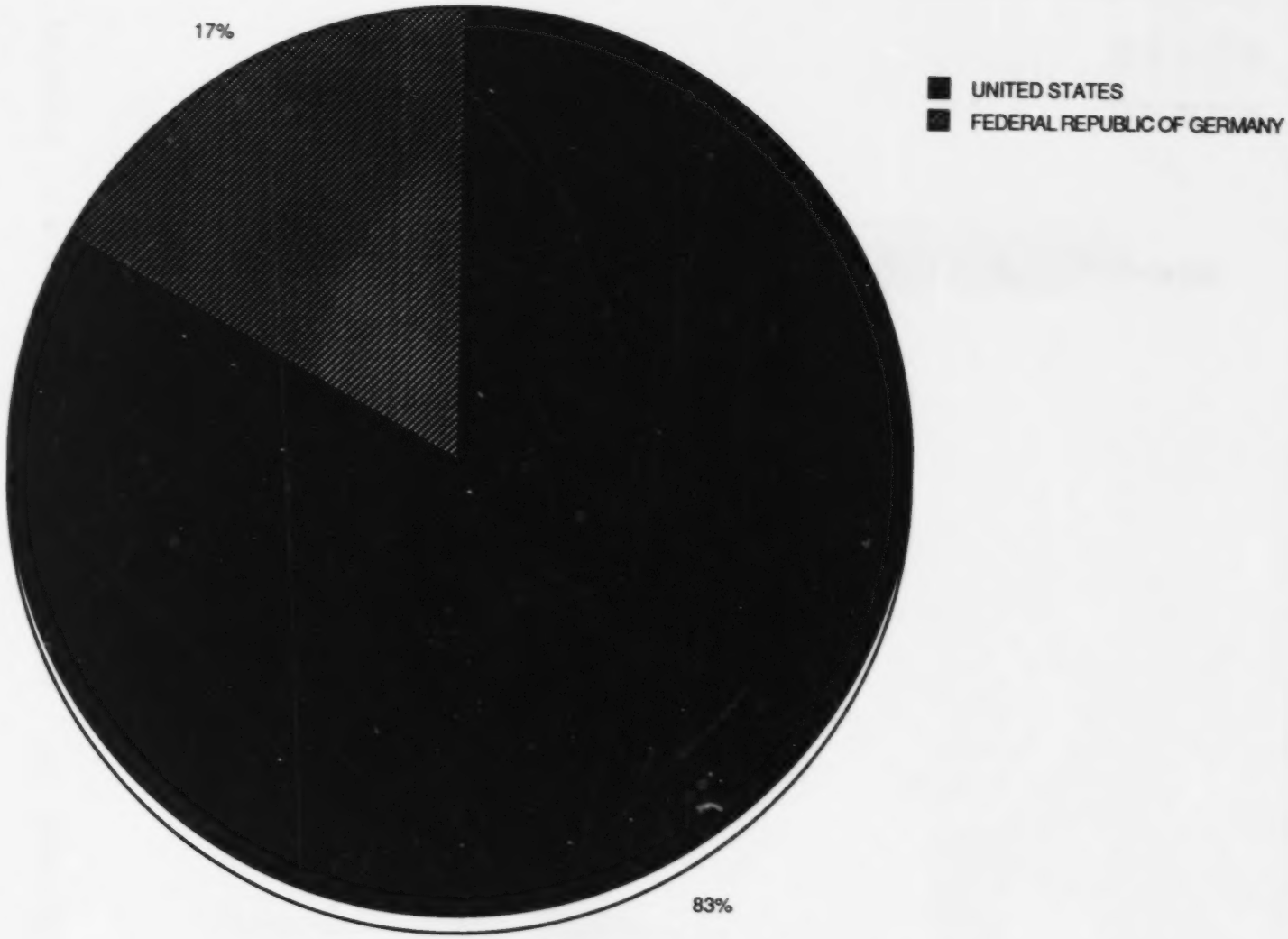

FIGURE 31. FUNDING OF REMEDIAL RESPONSE PROJECTS, BY NATION (TOTAL FUNDING = 8.8 MILLION DOLLARS)

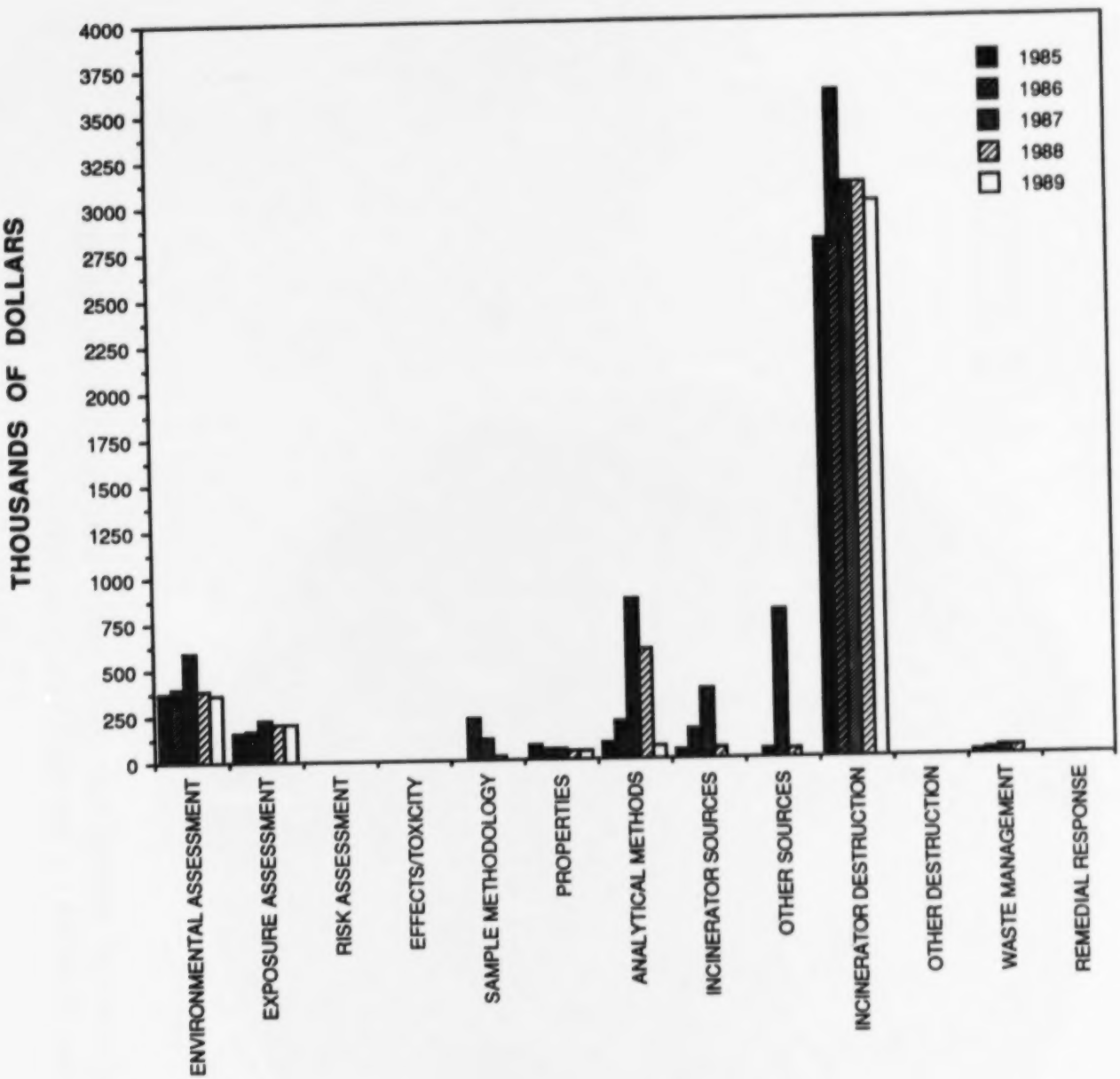

FIGURE 32. DISTRIBUTION OF RESOURCES - CANADA

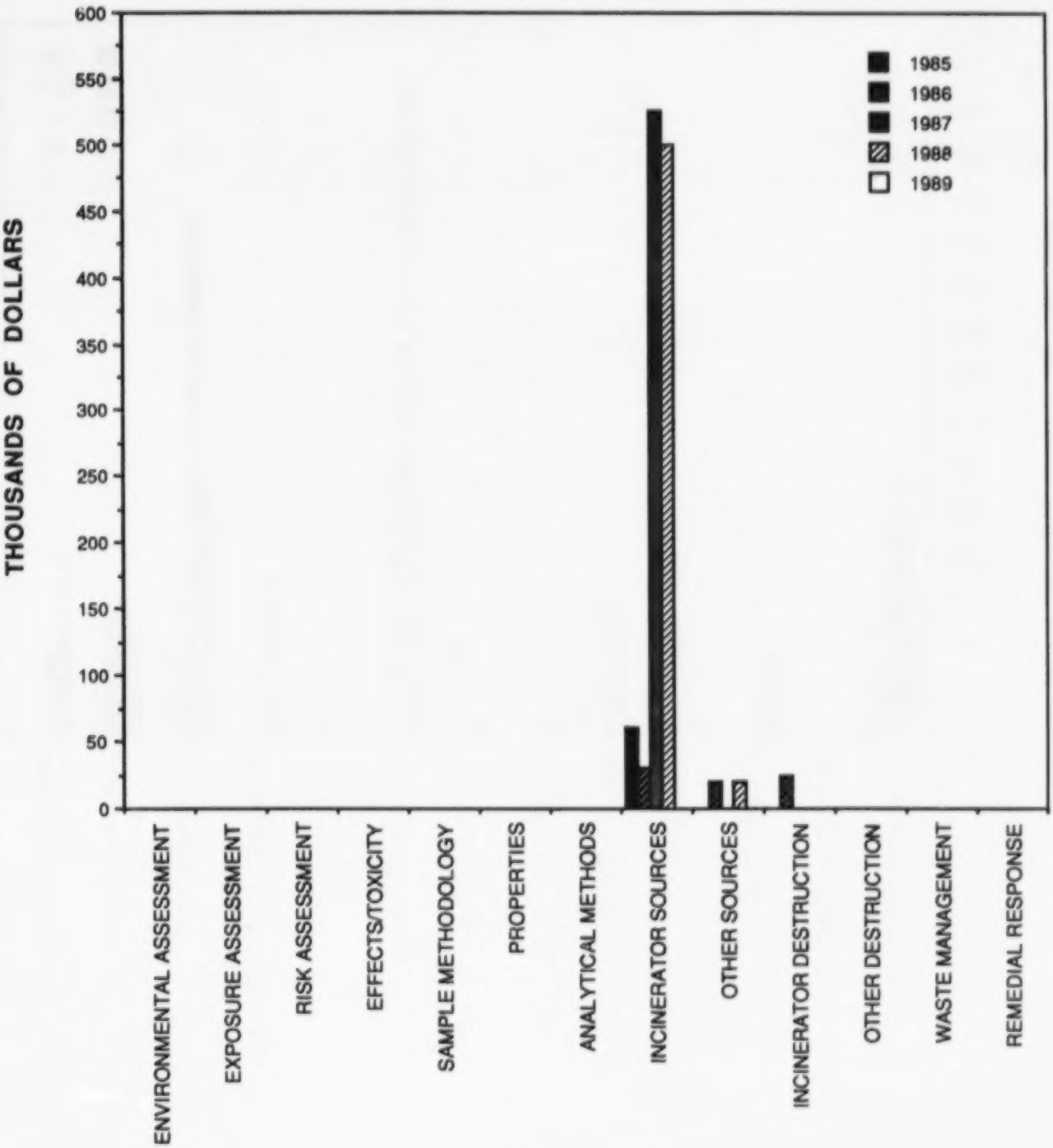

FIGURE 33. DISTRIBUTION OF RESOURCES - DENMARK

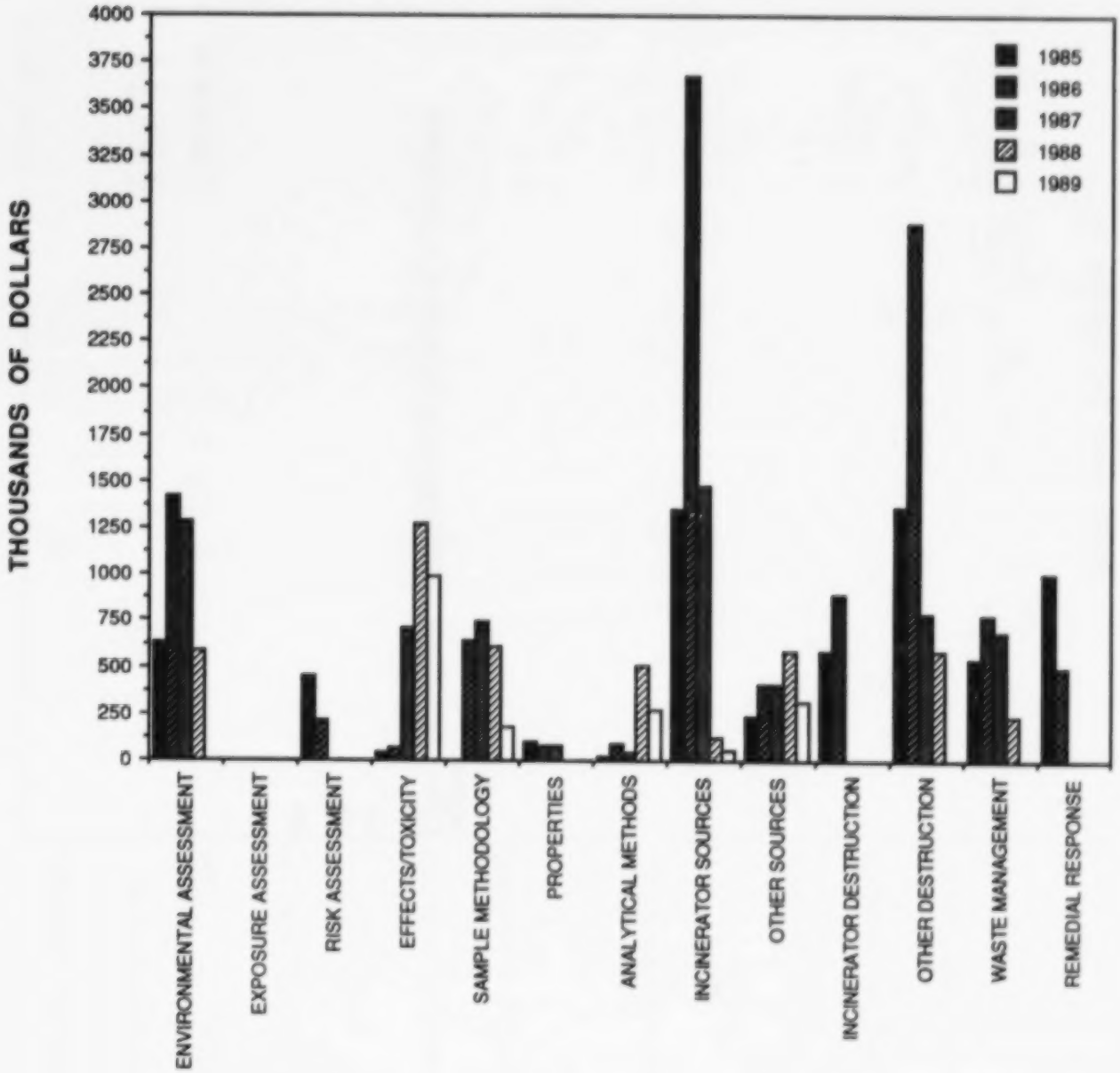

FIGURE 34. DISTRIBUTION OF RESOURCES - FEDERAL REPUBLIC OF GERMANY

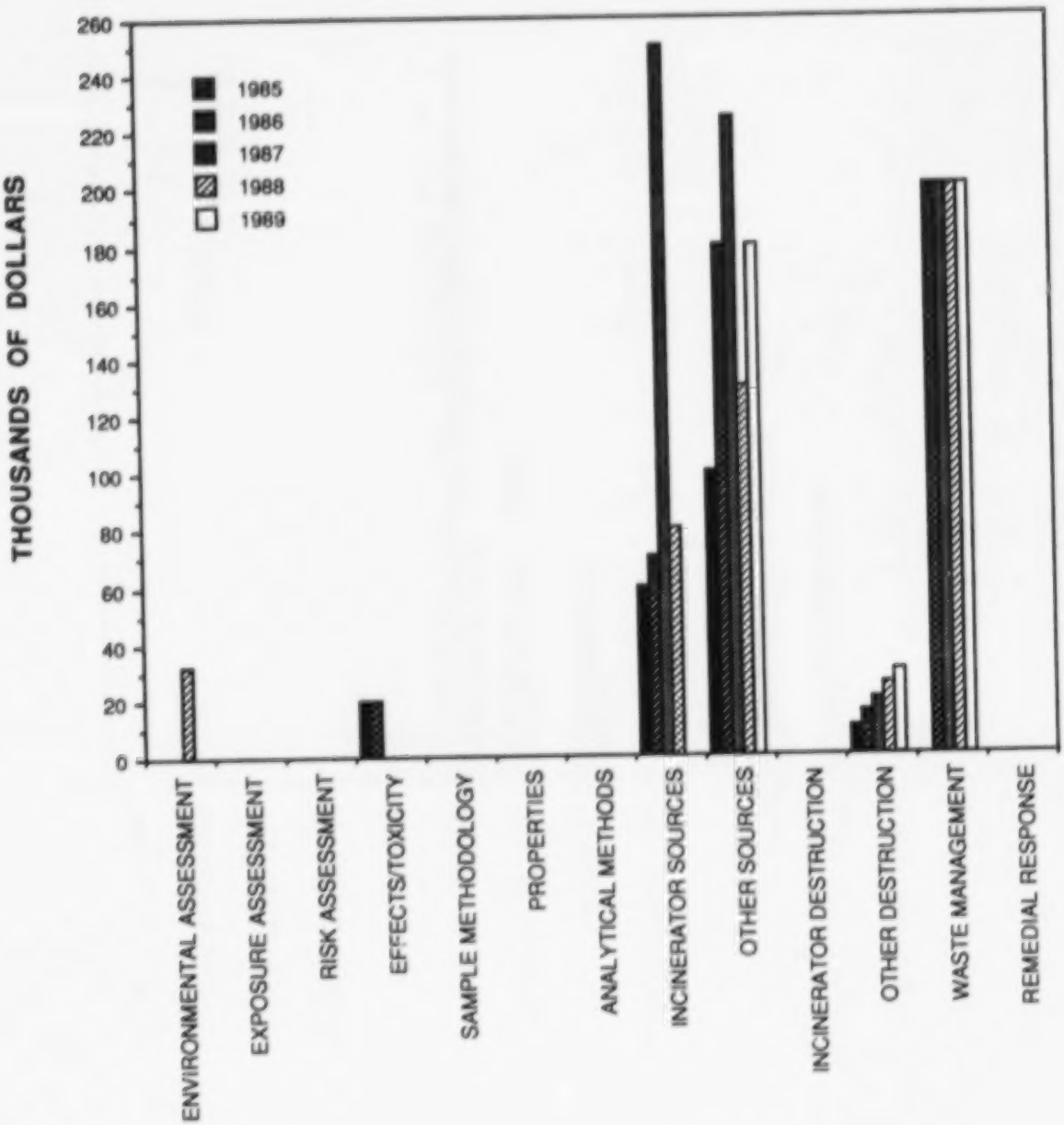

FIGURE 35. DISTRIBUTION OF RESOURCES - ITALY

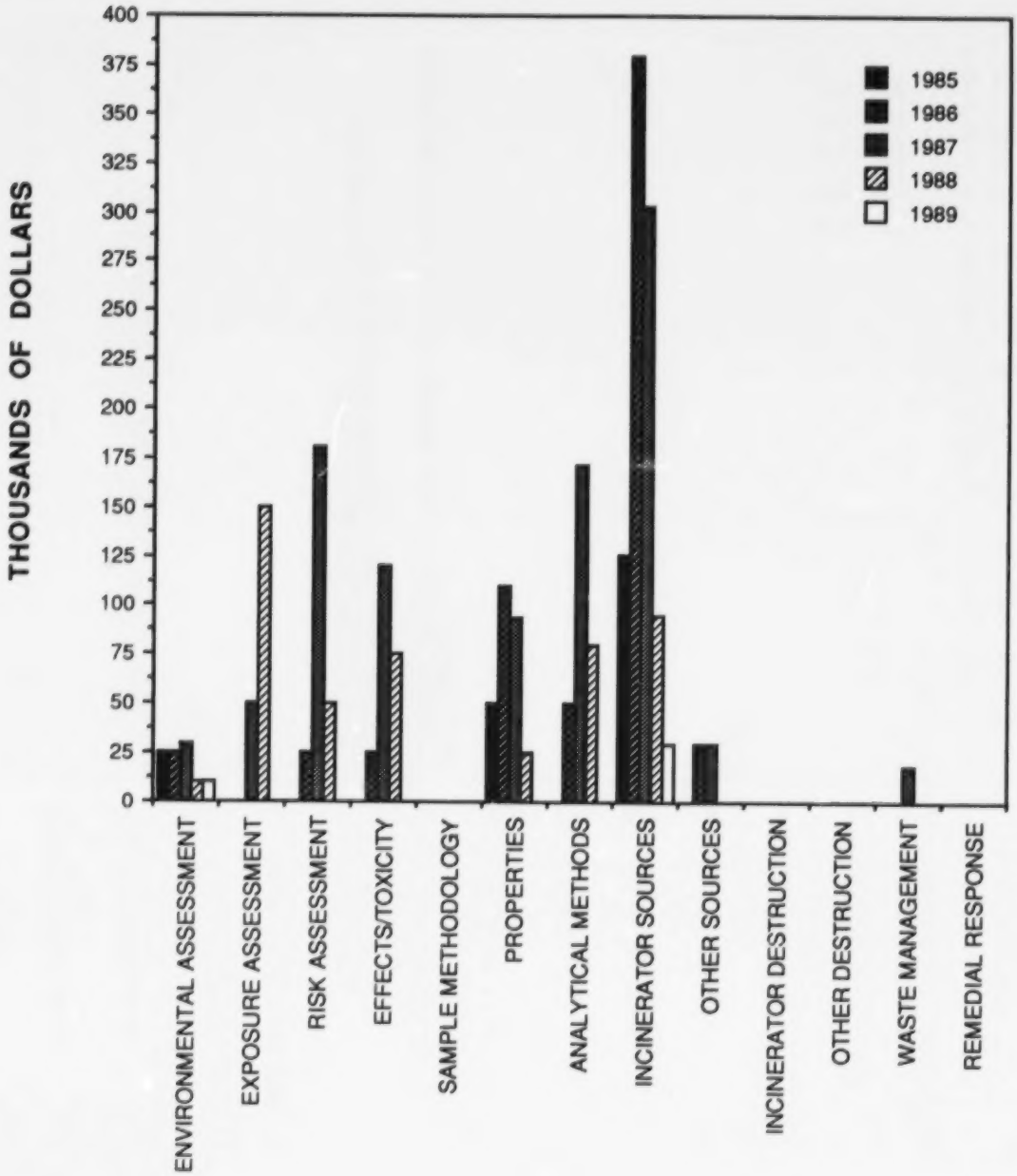

FIGURE 36. DISTRIBUTION OF RESOURCES - NETHERLANDS

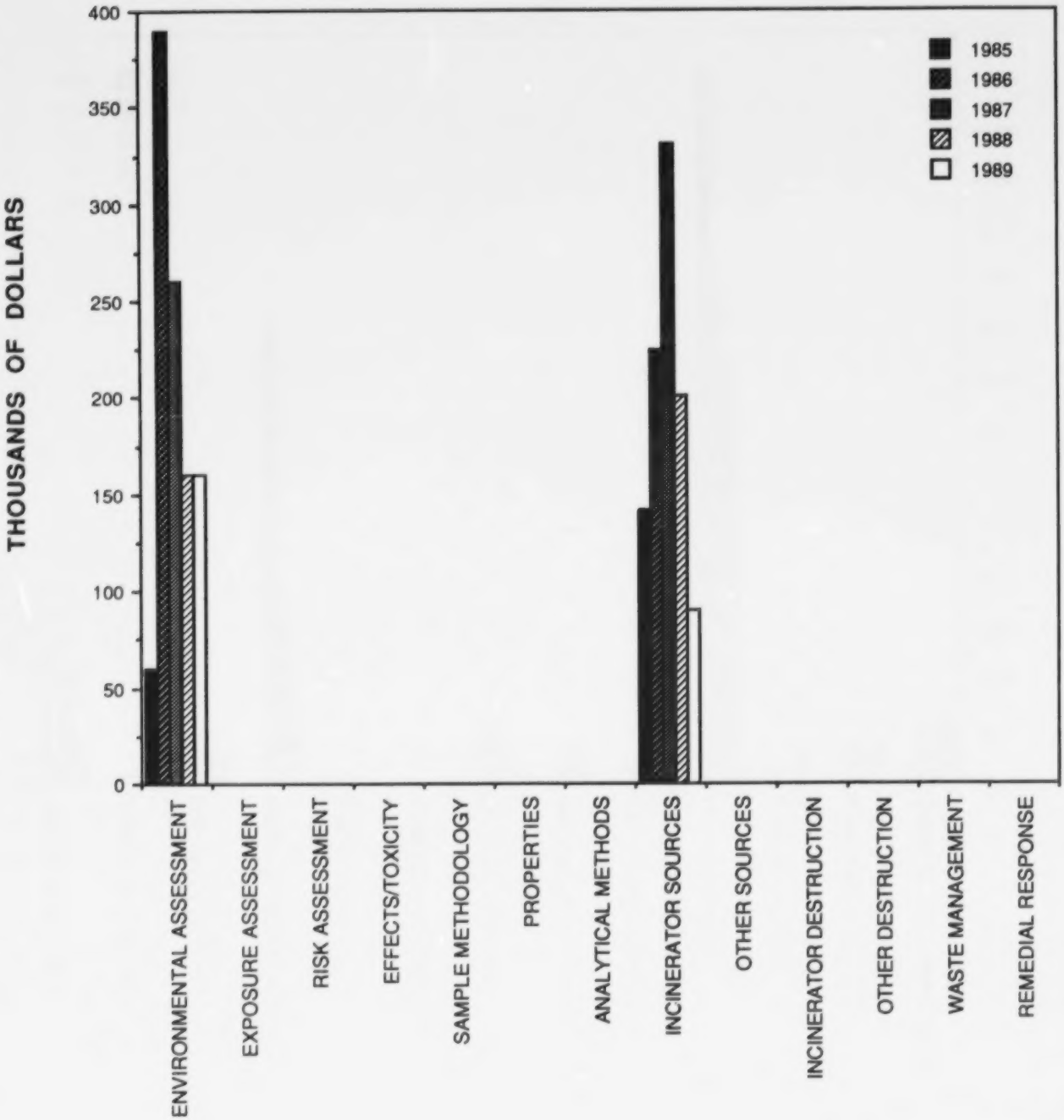

FIGURE 37. DISTRIBUTION OF RESOURCES - UNITED KINGDOM

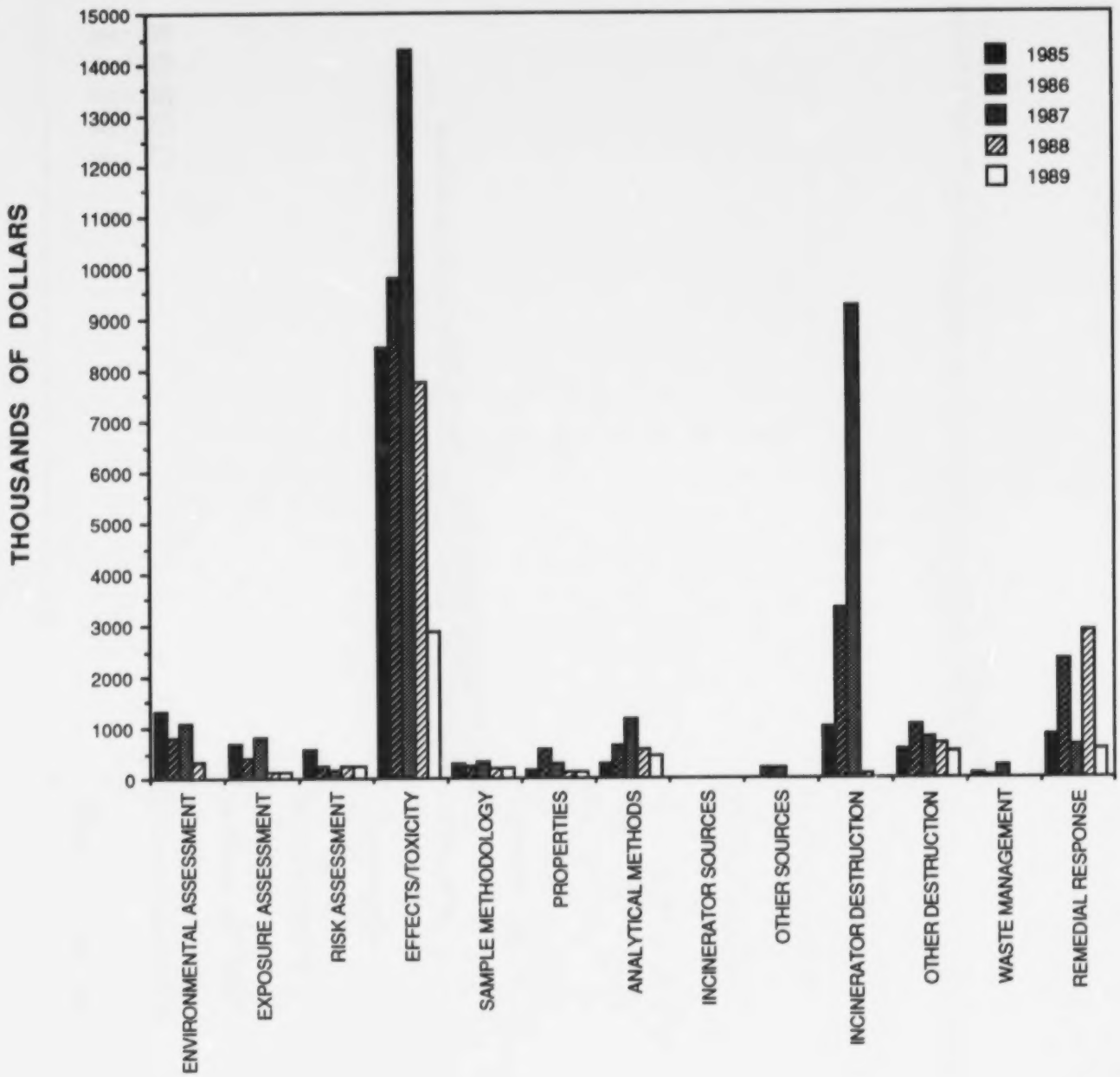

FIGURE 38. DISTRIBUTION OF RESOURCES - UNITED STATES

Appendix A.

Page number	Work group	Last name	First name	Title	Country
71	A	ALBRO	P	DEVELOPMENT OF ANALYTICAL METHODOLOGY	USA
73	A	AUST	S	TOXIC & ANORECTIC EFFECTS OF INVOLVING TCDD (RATS, MICE)	USA
75	A	BAINBRIDGE	J	HEALTH HAZARD EVAL. & TECH ASSIST INVOLVING PCB'S, DIOXS, ETC., FOR HAZARDOUS WASTE SITES, SPILLS, ETC.	USA
77	A	BECK		PCDD/PCDF IN ENVIRONMENT, FOOD & HUMAN SAMPLES INCLUDING BREAST MILK (SAMPLING, ANALYSIS, ASSESSMENT)	FRG
79	A	BELTON	T	DISTRIBUTION OF 3378-TCDD AND 2378-TCDF IN FINFISH & CRUSTACEANS FROM NEWARK BAY AND THE NY BIGHT	USA
81	A	BELTON	T	STUDY OF DIOXIN & FURAN BIOACCUMULATION IN BLUE CRABS & AMERICAN LOBSTERS FROM THE NY BIGHT	USA
83	A	BIANCARDI	G	DETERMINATION OF TCDD IN ENVIRONMENTAL SAMPLES	ITA
85	A	BIRNBAUM	L	TCDD TERATOGENICITY--MODULATION IN MIXTURES	USA
87	A	BIRNBAUM	L	TCDF: METABOLITE IDENTIFICATION	USA
89	A	BIRNBAUM	L	DISPOSITION OF HALOGENATED DIBENZOFURANS	USA
91	A	BIRNBAUM	L	STUDIES OF THE CHEMICAL DISPOSITION & METABOLISM OF OCDD	USA
93	A	BIRNBAUM	L	DIOXIN SKIN TOXICITY-HAIRLESS MICE	USA
95	A	BOPP	R	SEDIMENT SAMPLING & RADIONUCLIDE & CHLORINATED HYDROCARBON ANALYSIS IN NEWARK BAY AND RIVERS	USA
97	A	BOWMAN	R	PHARMACOKINETICS OF 2,3,7,8-TCDD IN MONKEYS	USA
99	A	BRINKMANN	F	AD HOC INVESTIGATIONS IN BEHALF OF THE INSPECTORATE OF PUBLIC HEALTH AND ENVIRONMENTAL HYGIENE	NET
101	A	BUDDE	W	DEVELOP COMPUTER SOFTWARE TO INTERPRET MASS SPEC DATA FROM SAMPLES CONTAINING DIOXINS & DIBENZOFURANS	USA
103	A	BURKE	M	OCCURRENCE OF DIOXIN IN PUBLIC WATER SUPPLIES	USA
105	A	BURT	V	A CASE CONTROL STUDY OF NON-HODGKIN'S LYMPHOMA	USA
107	A	CALLAHAN	M	ESTIMATING EXPOSURES TO 2,3,7,8-TCDD	USA
109	A	CARUSO	J	ATOMIC EMISSION SPECTROMETRY FOR DIOXIN TRACE ANALYSIS/EMPHASIS PLASMA SOURCE MASS SPECTROMETRY	USA
111	A	CHITTIM	B	SYNTHESIS OF PCDD, PCDF, BROMO DD & DF AND MIXED BR/CL DD & DF	CAN
113	A	CHOUDHRY	G	PHOTOINCORPORATION OF CHLORINATED AROMATIC POLLUTANTS (CAPS) INTO AQUATIC & SOIL HUMIC MATERIALS	CAN
115	A	CHOUDHRY	G	ENVIRONMENTAL AQUATIC PHOTOCHEMISTRY OF CHLORINATED AROMATIC POLLUTANTS (CAPS)	CAN
117	A	CHOUDHRY	G	ENVIRONMENTAL PHOTOCHEMISTRY OF POLYCHLORINATED DIPHENYL ETHERS IN AQUATIC SYSTEMS	CAN
119	A	CLEMENT	R	STORAGE STABILITY STUDY OF CDDs/CDFs IN FISH	CAN
121	A	COATES	J	PLANT UPTAKE & METABOLISM OF PCDD ISOMERS	USA
123	A	COOK	P	LAKE ONTARIO TCDD BIOACCUMULATION STUDY	USA
125	A	COOPER	K	BIOAVAILABILITY & PHYSIOLOGICAL EFFECTS OF DIOXINS/FURANS ON BIVALVE MOLLUSCS, CRUSTACEANS, & FINFISH	USA
127	A	CREASER	C	DETERMINE RANGE OF BACKGROUND LEVELS OF PCDDS & PCDFS IN SOILS	UK
129	A	CREASER	C	HMIP DIOXIN SURVEY	UK
131	A	DANN	T	AMBIENT AIR MEASUREMENT OF PARTICULATE & GAS PHASE DIOXIN & FURAN	CAN
133	A	DEROOS	F	EVALUATION OF AN EPA HIGH-VOLUME AIR SAMPLER FOR PCDDs/PCDFs	USA
135	A	DIEBOLD	G	OPTOACOUSTIC DETECTION OF CARCINOGENS	USA
137	A	DiDOMENICO	A	ROLE OF PLANTS IN ENVIRONMENTAL FATE OF CHLORINATED AROMATICS AND HETEROAROMATIC COMPOUNDS	ITA
139	A	ENDE	M	DETERMINATION OF PCDDs/PCDFs IN HUMAN MILK & FOODS	FRG
141	A	EPA REG 7		DIOXIN SAMPLING IN MISSOURI	USA

Appendix A. (continued)

Page number	Work group	Last name	First name	Title	Country
143	A	FINGERHUT	M	NIOSH DIOXIN REGISTRY & COHORT MORTALITY STUDY	USA
145	A	FRANCKE		IMPROVING ANALYTICAL METHODS FOR PCDDs/PCDFs	FRG
147	A	FREEMAN	R	MODELLING CLEARANCE OF NONMETABOLIZED CHLOROCARBONS (HEXACHLOROBENZENE)	USA
149	A	GALLO	M	COMPARATIVE BIOAVAILABILITY OF CHLORINATED DIOXIN IN NEW JERSEY & MISSOURI SOILS	USA
151	A	GASIEWICZ	T	CDDs, MECHANISMS OF TOXICITY (RATS, MICE, GUINEA PIGS)	USA
153	A	GASIEWICZ	T	CDDs, MECHANISMS OF TOXICITY (RATS, GUINEA PIGS)	USA
155	A	GASIEWICZ	T	MOLECULAR TOXICOLOGY OF TCDD (RATS, MICE, GUINEA PIGS, HAMSTERS)	USA
157	A	GIERTHY	J	DIOXIN-EPITHALIAL CELL INTERACTIONS - MECHANISM & ASSAY	CAN
159	A	GOBAS	F	RELATIONSHIP BETWEEN PHYSICO-CHEMICAL PROPERTIES & BIOACCUMULATION OF PCDDS IN AQUATIC ORGANISMS	CAN
161	A	GRANT	D	RE-EVALUATION OF PCDDS IN FOODS	USA
163	A	GROSS	M	ANALYTICAL DETERMINATION OF 2378-TCDD, 2378-TCDF, & THEIR CONGENERS IN RIVER & BAY SEDIMENTS	SWE
165	A	GUSTAFSSON	J	STRUCTURE & FUNCTIONS OF THE TCDD RECEPTORS (RATS)	FRG
167	A	HAGENMAIER	H	STUDIES ON PHARMACOKINETICS AND TOXICOLOGY OF A PCDD/PCDF MIXTURE IN RODENTS & PRIMATES	FRG
169	A	HAGENMAIER	H	CONTENT OF PCDD/PCDF IN SELECTED SOILS, SEDIMENTS & PLANTS	FRG
171	A	HAGENMAIER	H	STUDY ON PCDD AND PCDF IN THE ENVIRONMENT	FRG
173	A	HAGENMEIER	H	STUDY OF DIOXINS/FURANS IN SELECTED SOILS, PLANTS & SEDIMENTS	USA
175	A	HAILE	C	VALIDATION ON EMISSION TEST METHOD FOR DIOXINS	USA
177	A	HAWLEY	J	DEVELOPMENT OF HEALTH CRITERION DOCUMENT	NET
179	A	HELDER	T	COMPARISON OF THE TOXICITY OF SELECTED DDs & DFs & DETERMINATION OF TOXICITY OF MIXTURES	NET
181	A	HELDER	T	TOXICITY OF FLY-ASH AND FLUE GAS	FRG
183	A	HELGE	H	CHANGES OF THE IMMUNOSYSTEM AND INDUCTION OF MONOOXYGENASES UPON EXPOSURE TO DIOXIN	USA
185	A	HILEMAN	F	BACKGROUND POPULATION LEVELS OF SELECTED PCDDS/PCDFS	USA
187	A	HITES	R	ATMOSPHERIC EXPOSURES OF MAN TO COMBUSTION GENERATED CDDs/CDFs	USA
189	A	HOEL	D	INTERNATIONAL REGISTER OF PERSONS EXPOSED TO PHENOXY ACID HERBICIDES & CONTAMINANTS, PHASE II	CAN
191	A	HOLLEBONE	B	DEVELOPMENT OF AUTOMATED LARGE-VOLUME WATER SAMPLING METHODS USING SORBENT CARTRIDGES	USA
193	A	HOLSAPPLE	M	IMMUNOTOXICOLOGY BY CHLORINATED DIBENZO-P-DIOXINS (MICE)	CAN
195	A	HUNSINGER	R	ROUTINE & EMERGENCY MONITORING OF DRINKING WATER SUPPLIES FOR CDDs/CDFs	USA
197	A	HUSKOL	R	HALF-LIFE OF CHEMICALS IN SOIL	FRG
199	A	HUTZINGER	O	DEVELOPMENT OF NEW ANALYTICAL METHODS FOR ANALYSIS OF A COMPLEX MATRIX (PCDD/PCDF)	FRG
201	A	HUTZINGER	O	PHARMACOKINETICS & TOXICOLOGY OF PBDD AND PBDF IN RODENTS-ANALYSIS OF ORGANS	NET
203	A	JANSEN	E	DEVELOPMENT OF A CHEMOLUMINESCENT IMMUNOASSAY FOR CDDs/CDFs	CAN
205	A	JOHNSON	A	FISH CONTAMINANTS PROGRAM	USA
207	A	JONES	D	UPTAKE OF 2,3,7,8-TCDD BY DAIRY COWS	USA
209	A	KAHN	P	ROLE OF ACTIVATED OXYGEN IN THE TOXIC DAMAGE PRODUCED BY 2,3,7,8-TCDD	USA
211	A	KANG	H	VIETNAM VETERANS MORTALITY STUDY	USA
213	A	KANG	H	WOMEN VIETNAM VETERANS HEALTH STUDY	

Appendix A. (continued)

Page number	Work group	Last name	First name	Title	Country
215	A	KANG	H	VA/AFIP CASE CONTROL STUDY OF SOFT TISSUE SARCOMA	USA
217	A	KANG	H	SOFT TISSUE SARCOMA & MILITARY SERVICE IN VIETNAM	USA
219	A	KANG	H	RETROSPECTIVE STUDY OF DIOXINS & FURANS IN ADIPOSE TISSUE	USA
221	A	KARASEK	F	DEVELOPMENT OF EFFECTIVE/RAPID CLEANUP PROCEDURES FOR ANALYSIS OF PCDD/PCDF IN FISH & OTHER BIOTA	CAN
223	A	KARASEK	F	METHODOLOGY FOR COMPLETE ANALYSIS OF COMPLEX MIXTURES	CAN
225	A	KARASEK	F	PROCEDURE FOR THE 2,3,7,8-SUBSTITUTED ANALYSIS OF PCDD/PCDF, ETC IN ENVIRONMENTAL SAMPLES	CAN
227	A	KERKVLIET	N	ALTERATIONS IN CELL SURFACE MARKER EXPRESSION BY DIOXINS (MICE)	USA
229	A	KONIETZKO		EPIDEMIOLOGICAL STUDY	FRG
231	A	KONIG	W	IMMUNE-TOXICOLOGICAL STUDY OF EXPOSED PERSONS FOR EFFECTS OF HALOGENATED DIOXINS, ETC. - ALLERGOLOGIC STDY	FRG
233	A	KORTE	F	THERMOLYSIS OF PRODUCTS CONTAINING HALOGENATED ORGANIC COMPOUNDS	FRG
235	A	LAO	R	DEVELOPMENT OF ANALYTICAL METHODS FOR THE MEASUREMENT OF PCDD/PCDF IN ENVIRONMENTAL SAMPLES	CAN
237	A	LAO	R	DETERMINATION OF PHYSICO-CHEMICAL PROPERTIES OF PCDD/PCDF	CAN
239	A	LINTAS	C	CONTAMINANT RESIDUES IN MARINE ORGANISMS AND THEIR IMPACT ON THE FOOD CHAIN	ITA
241	A	LOCKWOOD	K	ANALYSIS OF 2378-TCDD, 2378-TCDF, PCB'S, & PAH'S IN FISH AND LOBSTER LIVER TISSUE	USA
243	A	LODGE	K	DIOXIN BIOAVAILABILITY - FOOD CHAIN	USA
245	A	LUCIER	G	RECEPTOR ACTION AND LIVER TUMOR PROMOTION	USA
247	A	LUETZKE	K	TESTING OF SAMPLE TECHNIQUES FOR EMISSION MEASUREMENTS OF PCDD/PCDF	FRG
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275	A	MUIR	D	BIOAVAILABILITY OF DIOXINS	CAN
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301	A	PIPER	W	TOXICANT DEREGULATION OF ENDOCRINE HEME BIOSYNTHESIS (RATS, HAMSTERS, GUINEA PIGS)	USA
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305	A	POLAND	A	STUDIES ON THE HALOGENATED AROMATIC HYDROCARBONS (MICE, HAMSTERS, RATS)	USA
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313	A	PUHVEL	M	MECHANISMS OF TOXICITY OF DIOXIN (MICE)	ITA
315	A	RICE	R	KERATINOCYTE ENVELOPES--PHYSICAL & TOXIC MECHANISMS (RATS, RABBITS, HUMANS)	USA
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325	A	ROZMAN	K	MECHANISMS OF SPECIES DIFFERENCES IN TCDD TOXICITY	FRG
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329	A	RYAN	J	PCDD/PCDF: METHOD DEVELOPMENT SURVEY OF FOODS & BIOLOGICAL SAMPLES TO ESTIMATE EXPOSURE & SOURCES	USA
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517	B	JACKSON	D	EFFECTS OF OTHER NON-POLAR ORGANICS ON MOVEMENT OF DIOXINS & FURANS IN SOILS	USA
519	B	JAMES	L	TIMES BEACH RESEARCH FACILITY	USA
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589	B	WAHL	H	CAUSES & REMOVAL OF PCDD/PCDF EMISSIONS FROM 3 INCINERATION PLANTS IN SCHLESWIG - HOLSTEIN	FRG
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597	B	WILDERER		BIOLOGICAL TREATMENT OF DIOXIN CONTAMINATED LEACHATE FROM LANDFILL - HAMBURG	FRG
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607	B	ZARTH		OCCUPATIONAL HEALTH & SAFETY REGULATIONS & ANALYTICAL SCREENING PROGRAMS FOR PCDD/PCDF CLEAN-UP	FRG
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613	C	EPA REG 7		REMOVAL OF DIOXIN CONTAMINATED SOIL AT QUAIL RUN MOBIL MANNER	USA
615	C	EPA REG 7		CAPPING OF DIOXIN CONTAMINATED MATERIAL AT FRONTENAC	USA
617	C	EPA REG 7		CAPPING OF DIOXIN CONTAMINATED MATERIAL AT EAST NORTH STREET	USA
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Formats

Working Group A

Exposure and Hazard Assessment

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Development of analytical methodology

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

P.W. Albro
NIEHS, NIH

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

In-house project

IDENTIFYING NUMBER: 1Z01 ES30003-13 STARTING DATE: 1 /10 /82 COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

To develop, validate and apply methods for the determination of PCDDs and PCDFs at low levels in environmental samples, including extraction and cleanup of soil, adipose tissue and liver. An international collaborative study with 10 laboratories (which all use different techniques) is in progress to analyze human adipose tissue for dioxins and furans at the low ppt level. Animal tissues and soil were analyzed to study the bioavailability of 2,3,7,8-TCDD bound to soil.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	(Environmental) Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation (Bioavailability) Biotransformation Equivalency Chemicokinetics
	(Analytical Methods)		Physiologic Genetic (2378 TCDD) TCDD (PCDD) (PCDF) Other Compounds Standards QA/QC (Methods Research)
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge (Soil) Sediment Water Air (Tissue) Food (Animal) (Human) (Environmental) Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Toxic and anorectic effects of TCDD (rats, mice)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Steven D. Aust
Michigan State University
East Lansing, MI 48824

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 ES03585-02 STARTING DATE: 1/1/85 COMPLETION DATE: 12/30/87

GOAL/RATIONALE/SCOPE:

To determine the mechanism by which 2,3,7,8-TCDD is anorectic and toxic. In the first approach, the decreased serum thyroxine levels (caused by 2,3,7,8-TCDD) resulting in increased releases of the anorectic thyrotropin releasing hormone will be studied. For the second approach, the effect of 2,3,7,8-TCDD on the absorption of vitamin A from the serum or the inability to utilize vitamin A in extrahepatic tissues will be investigated.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 147 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological) Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics (Physiologic) Genetic (2378 TCDD) TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	(Toxicity) Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air (Tissue) Food (Animal) Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B (C) **COUNTRY OF ORIGIN:** U.S.A.

TITLE OF PROJECT OR ACTIVITY:
HEALTH HAZARD EVALUATION AND TECHNICAL ASSISTANCE INVOLVING PCB'S, DIOXINS, ETC., FOR HAZARDOUS WASTE SITES, SPILLS, TRANSFORMER FIRES, ETC.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
CONTACT: JAY BAINBRIDGE, PHONE: 513/841-4374
NATIONAL INSTITUTE FOR OCCUPATIONAL SAFETY AND HEALTH, DIVISION OF SURVEILLANCE, HAZARD EVALUATIONS & FIELD STUDIES, HEALTH EVALUATIONS & TECHNICAL ASSISTANCE BRANCH, 4676 Columbia Parkway, Cincinnati, Ohio 45226

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
NATIONAL INSTITUTE FOR OCCUPATIONAL SAFETY AND HEALTH, DIVISION OF SURVEILLANCE, HAZARD EVALUATIONS & FIELD STUDIES, HEALTH EVALUATIONS & TECHNICAL ASSISTANCE BRANCH, 4676 Columbia Parkway, Cincinnati, Ohio 45226
CONTACT: JAY BAINBRIDGE, PHONE: 513/841-4374.

IDENTIFYING NUMBER: _____ **STARTING DATE:** / / **COMPLETION DATE:** / /
CONTINUOUS

GOAL/RATIONALE/SCOPE:
HEALTH EVALUATIONS ARE EVALUATED AT THE REQUEST OF EMPLOYEES, EMPLOYEE REPRESENTATIVES, EMPLOYEES OF OTHER FEDERAL AGENCIES, AND STATE AND LOCAL AGENCIES (PURSUANT TO SECTION 20(a)(6) OF THE OCCUPATIONAL SAFETY AND HEALTH ACT) TO DETERMINE IF SUBSTANCES ARE HAZARDOUS AS USED OR FOUND IN THE WORKPLACE. THIS INCLUDES HAZARDOUS WASTE SITES.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 100 K	$ 100 K	$ 100 K	$ 100 K	$ 100 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
HEALTH HAZARD EVALUATION REPORTS PROVIDED TO INVOLVED PARTIES OF WASTE SITE; AND TECHNICAL JOURNAL ARTICLES ARE PUBLISHED. THERE ARE TOO MANY TO LIST HERE. IF LIST IS ACTUALLY NEEDED, CONTACT ABOVE INDIVIDUAL.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	2378 TCDD TCDD PCDD PCDF Other Compounds
	Analytical Methods			Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental		
	Waste Management	Interim Storage Exposure Control	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) ~~B C D E~~ **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
PCDD and PCDF in the Environment, Food and Human Samples including Breast-Milk (Sampling, Analysis, Assessment)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. Beck, Max-von-Pettenkofer-Institut, Bundesgesundheitsamt, 1000 Berlin 33, (030) 8903-2595

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Gesellschaft für Strahlen- und Umweltforschung mbH, München, (089) 3187-3372, (Dr. Ende)

IDENTIFYING NUMBER: 076 500 1/4 **STARTING DATE:** 1/7/85 **COMPLETION DATE:** 31/12/88

GOAL/RATIONALE/SCOPE:
Determination of the general load of PCDD/PCDF for human beings, development of analytics

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ 189 K	$ 590 K	$ 590 K	$ 590 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
reports, publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY: The distribution of 3,3,7,8-TCDD and 2,3,7,8-TCDF in finfish and Crustaceans from Newark Bay and the New York Bight.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Thomas Belton, M.A. (609) 984-6070
N. J. Department of Environmental Protection
Office of Science and Research
401 East State Street, CN-409
Trenton, NJ 08625

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Same as above

IDENTIFYING NUMBER: N/A **STARTING DATE:** 7/1/83 **COMPLETION DATE:** 10/30/85

GOAL/RATIONALE/SCOPE: To investigate the levels and extent of aquatic contamination in an estuarine river and embayment contaminated with dioxin and furans due to improper waste management techniques at a number of pesticide and bactericide manufacturers on the drainage. Fish, crabs, lobsters and sediments were sampled across the entire tidal range and near the ocean dumpsite for harbor dredge spoils. Extensive contamination uncovered.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 95 K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

1. TECHNICAL REPORT: Belton, T. J., Hazen, R., Ruppel, B., Lockwood , K., Mueller, R., Stevenson, E., and J. J. Post (1985). A Study of Dioxin (2,3,7,8-Tetrachlorodibenzo-p-Dioxin) Contamination in Select Finfish, Crustaceans and Sediments of New Jersey Waterways, New Jersey Department of Environmental Protection, Technical Report.
2. Journal Article:

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY:
A Study of Dioxin (2,3,7,8-TCDD) and Furan (2,3,7,8-TCDF) Bioaccumulation in Blue Crabs and American Lobsters from the New York Bight

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Thomas Belton, M.A.
Office of Science and Research
NJ Dept. of Environmental Protection (609) 984-6070
401 E. State St., CN-409
Trenton, NJ 08625

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Same as Above

IDENTIFYING NUMBER: _____ **STARTING DATE:** 1/1/85 **COMPLETION DATE:** 10/1/87

GOAL/RATIONALE/SCOPE: To investigate:
1) The levels and extent to which the winter blue crab and inshore American lobster fisheries have been contaminated by 2,3,7,8-TCDD.
2) If there exists a geographical, temporal or physiological relationship between contaminant concentration and species of concern
3) Will quantify the health risk to the consumers utilizing this resource via quantitative risk assessment methodologies.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 90 K	$ 40 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
-Technical Report
-Journal Article
-Policy Paper

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: Italy

TITLE OF PROJECT OR ACTIVITY: Determination of TCDD in Environmental Samples

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Multizonale di Prevenzione USL no2 Regione Toscana - via del Patriota no2
54100 Massa(MS) Tel. 0585/40676
Dr. Gino Biancardi, Dr. Gino Camici

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Regione Toscana - USL no2 - via del Patriota no2 54100 Massa(MS) 0585/40676

IDENTIFYING NUMBER: _____ STARTING DATE: 17 /03/ 84 COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE: Contamination level of TCDD in Pesticide chemical industry--
Control of the decontamination.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents) Control as provided by law. Technical Reports, Publications.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	(Assessment)	(Environmental)	(Monitoring)	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	(2378 TCDD)
		Effects	Pharmacological	(TCDD)
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
			(Soil)	Human
	Destruction	Incineration	Sediment	Environmental
		Detoxification	(Water)	Manufacturing Products
		Physicochemical	Air	Plant
		Biological	Tissue	Cell Cultures
		Environmental		
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	(Decontamination)	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

TCDD teratogenicity--Modulation in mixtures

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

L.S. Birnbaum 919-541-3583
NIEHS, NIH
STB/Chemical Disposition
Research Triangle Park, NC 27709

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

In-house project

IDENTIFYING NUMBER: 1Z01 ES21070-02 STARTING DATE: / /83 COMPLETION DATE: / /88

GOAL/RATIONALE/SCOPE:

To use teratogenicity (induction of cleft palate and hydronephrosis in mice) to measure the interaction of TCDD and other compounds with which it occurs in the environment, including PCDFs, PCBs, hormones such as thyroxins and hydrocortisone, drugs, and vitamin A. Mechanism of hydronephrosis. Teratogenicity of other dioxin-like chemicals (hexabrominated naphthalenes, PFDA).

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 75 K	$ 75 K	$ 75 K	$ 75 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY:

TCDF; Metabolite identification

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

L.S. Birnbaum
STB/Chemical Disposition
NIEHS
Research Triangle Park, NC 27709
919-541-3583

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

In-house project

IDENTIFYING NUMBER: _____ STARTING DATE: / / 86 COMPLETION DATE: / / 88

GOAL/RATIONALE/SCOPE:

To determine metabolites produced in vivo from TCDF. Suggested metabolites are synthesized; excreta from rats are checked to determine if these suggested metabolites are produced after treatment.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 25 K	$ 25 K	$ 25 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Disposition of halogenated dibenzofurans

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

L.S. Birnbaum
STB/Chemical Disposition
NIEHS, NIH
Research Triangle Park, NC 27709
919-541-3583

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

In-house project

IDENTIFYING NUMBER: 1Z01 ES21003-05 STARTING DATE: / /79 COMPLETION DATE: / /88

GOAL/RATIONALE/SCOPE:

To characterize the TCDF metabolites produced by the rat, the distribution to the fetus after maternal TCDF exposure, the role of body composition on the disposition of TCDD in congenic mouse strains, and absorption of OCDD from the gastrointestinal tract and the effect of dose on absorption in rats. To investigate metabolism and disposition of 1,2,3,7,8-Penta CDF, 2,3,4,7,8-PCDF, and 1,2,3,4,7,8-HCDF in rats, and 2,3,4,7,8-PCDF in monkeys, and to determine the TCDD-like toxicity of low-level repeated OCDD exposure.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 150 K	$ 50 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	
	Analytical Methods			Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: Studies of the chemical disposition and metabolism of octachlorodibenzo-dioxin (OCDD)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

L.S. Birnbaum 919-541-3583
STB/Chemical Disposition
NIEHS
Research Triangle Park, NC 27709

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

In-house project

IDENTIFYING NUMBER: _____ STARTING DATE: / /84 COMPLETION DATE: / /87

GOAL/RATIONALE/SCOPE:

To determine the disposition of OCDD and toxicity after repeated exposure. Rats are dosed with ^{14}C-OCDD, and tissue distribution and elimination are monitored. Repeated exposure results in toxic changes in the liver and induction of enzymes diagnostic of TCDD-like exposure.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 35 K	$ 40 K	$ 35 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)		Environmental	Monitoring	(Physiologic)
	(Assessment)	Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	(Pharmacological)	TCDD
				(PCDD)
		(Toxicity)		PCDF
	Properties	Synthesis	Bioaccumulation	Other Compounds
		Physicochemical	Bioavailability	
		Reactivity/Stability	Biotransformation	
	Analytical Methods	Biological	Equivalency	Standards
		Sampling	Chemicokinetics	QA/QC
				Methods Research
B		Manufacturing	Emissions	
	Sources	Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	(Animal)
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: Dioxin skin toxicity - Hairless mice

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

L.S. Birnbaum 919-541-3583
STB/Chemical Disposition
NIEHS
Research Tria gle Park, NC 27709

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

In-house project

IDENTIFYING NUMBER: _____ STARTING DATE: / /86 COMPLETION DATE: / /90

GOAL/RATIONALE/SCOPE:

To understand the involvement of tissue growth factors in the toxic response of the skin to TCDD exposure. Hairless mice are treated with TCDD, and skin removed at selected intervals is analyzed for histological and biochemical changes.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 40 K	$ 40 K	$ 40 K	$ 40 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation Equivalency	Other Compounds Standards
	Analytical Methods	Biological Sampling	Chemicokinetics	QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY:
Sediment Sampling and Radionuclide and Chlorinated Hydrocarbon Analysis in Newark Bay and Hackensack and Passaic Rivers.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. Richard Bopp
Lamont Doherty Geological Observatory
Columbia University
Pallisades, New York 10964
(914) 359-2900

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)
Fredrika C. Moser
Office of Science and Research
NJ Dept. of Environmental Protection (609) 984-6070
401 E. State St., CN-409
Trenton, NJ 08625

IDENTIFYING NUMBER: 24096/22483 **STARTING DATE:** 06/01/85 **COMPLETION DATE:** 09/01/87

GOAL/RATIONALE/SCOPE: Determine geochronology of sediment and associated pollutant accumulation in Newark Bay system. Geochronology includes radionuclide (^{137}Cs, ^{7}Be) analyses, organochlorinated pesticide and PCB accumulation on sediment cores. Dioxin analysis is also conducted on sediments, selected based on previously stated analyses, by Dr. M. Gross, Univ. of Nebraska. The goal is to understand present and past distribution of contaminants in this estuary and its implications on dredge disposal practices.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 59,985 K	$ 64,990 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents); Anticipated
1) Scientific, refereed journal article.
2) NJDEP policy paper

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: Pharmacokinetics of 2,3,7,8-TCDD in Monkeys

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Robert E. Bowman
University of Wisconsin
22 N Charter Street
Madison, Wisconsin 53715

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

U. S. Environmental Protection Agency
401 M Street, SW
Washington, DC 20460
Contact: Dr. Babasaheb Sonawane 202-382-7495

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IDENTIFYING NUMBER: _____ STARTING DATE: 01/01/84 COMPLETION DATE: 12/01/86

GOAL/RATIONALE/SCOPE: The objectives of this project have been to determine the distribution and rate of transport of 2,3,7,8-TCDD in Rhesus monkeys, to evaluate the effect of TCDD in diet on birth weight and other breeding characteristics, and to determine the effect of TCDD on lymphocyte cells. Knowledge concerning the behavior and fate of TCDD in this primate will permit more accurate estimates of risk from TCDD for man. Data continue to be gathered for monkeys now off diets containing 5 and 25 ppt TCDD; these include data for tissue distribution, half-life determination, breeding results and gene mutations.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 136.0 K	$ 207.0 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

N/A

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	
	Analytical Methods	Sampling		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: Pharmacokinetics of 2,3,7,8-TCDD in Monkeys

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Robert E. Bowman
University of Wisconsin
22 N Charter Street
Madison, Wisconsin 53715

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

U. S. Environmental Protection Agency
401 M Street, SW
Washington, DC 20460
Contact: Dr. Babasaheb Sonawane 202-382-7495

IDENTIFYING NUMBER: _____ STARTING DATE: 01/01/84 COMPLETION DATE: 12/01/86

GOAL/RATIONALE/SCOPE: The objectives of this project have been to determine the distribution and rate of transport of 2,3,7,8-TCDD in Rhesus monkeys, to evaluate the effect of TCDD in diet on birth weight and other breeding characteristics, and to determine the effect of TCDD on lymphocyte cells. Knowledge concerning the behavior and fate of TCDD in this primate will permit more accurate estimates of risk from TCDD for man. Data continue to be gathered for monkeys now off diets containing 5 and 25 ppt TCDD; these include data for tissue distribution, half-life determination, breeding results and gene mutations.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 136.0 K	$ 207.0 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

N/A

KEY WORDS: (circle appropriate key words on reverse side)

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Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Ad hoc investigations in behalf of the Inspectorate of Public Health and Environmental Hygiene

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. F.J.J. Brinkmannn, National Institute of Public Health and Environmental Hygiene
P.O. Box 1, 3720 BA BILTHOVEN
tel. (30) 742998

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

IDENTIFYING NUMBER: 0840240 **STARTING DATE:** 01/01/84 **COMPLETION DATE:** /

GOAL/RATIONALE/SCOPE: Measurements in case of incidents
Evaluations and advices

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
reports (about 3 or 4 per year, usually confidential)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics 2378 TCDD TCDD PCDD PCDF Other Compounds
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
"Development of Computer Software to Interpret Mass Spectral Data from Samples Containing Chlorinated Dioxins and Chlorinated Dibenzofurans"

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

William L. Budde, Ph.D., U.S. Environmental Protection Agency, Physical and Chemical Methods Branch, Advanced Instrumentation Section, 26 W. St. Clair Street, Cincinnati, OH 45268 513-569-7309

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

William L. Budde, Ph.D., U.S. Environmental Protection Agency, Physical and Chemical Methods Branch, Advanced Instrumentation Section, 26 W. St. Clair Street, Cincinnati, OH 45268 513-569-7309

IDENTIFYING NUMBER: _____ STARTING DATE: 10/01/85 COMPLETION DATE: 09/30/88

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GOAL/RATIONALE/SCOPE:

To improve the quality of data obtained from mass spectrometric measurements, computer software has been developed to emulate human mass spectral data interpretation procedures. This software, which operates on a GC/MS system computer, applies identification criteria more consistently and more rigorously than a human analyst can.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 20 K	$ 20K	$ 20 K	$ 20 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Journal article in preparation -- same title as project.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Occurrence of dioxin in public water supplies

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Michael Burke
Bureau of Public Water Supply Protection
NYS Dept. of Health
Albany, NY 12237 518-474-5577

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

same as above

IDENTIFYING NUMBER: _____ STARTING DATE: 7 / / 86 COMPLETION DATE: 12 / / 87

GOAL/RATIONALE/SCOPE: Determine concentration of chlorinated dioxin compounds in public water supplies; advise water suppliers on public health significance. Establish regulatory policy

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 80 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: US

TITLE OF PROJECT OR ACTIVITY: A Case Control Study of Non-Hodgkin's Lymphoma

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Vicki L. Burt
Office of Environmental Epidemiology (202) 653-1891
Veterans Administration
1730 K St, N.W. Riddell Bldg. Room 401 Wash. D.C. 20006-3868

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)

Same as above.

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IDENTIFYING NUMBER: _____ STARTING DATE: 7 / 1 / 87 COMPLETION DATE: 9 / 30 / 90 ~~86~~

GOAL/RATIONALE/SCOPE:

To investigate the possible association between non Hodgkin's lymphoma and Vietnam service, Agent Orange exposure and other risk factors.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ 150 K	$ 150 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

scientific publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	(Assessment)	Environmental Exposure Body Burden (Risk) Effects	Monitoring Pathways (Epidemiology) Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods	Sampling		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: Estimating Exposures to 2,3,7,8-TCDD

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Mr. Mike Callahan
401 M Street, SW (RD-689)
Washington, D.C. 20460
202-475-8909

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
U.S. Environmental Protection Agency
401 M Street, SW
Washington, D. C. 20460
Contact: Mr. Mike Callahan 202-475-8909

IDENTIFYING NUMBER: _____ STARTING DATE: 06/01/86 COMPLETION DATE: 12/01/87

GOAL/RATIONALE/SCOPE: Procedures for calculating exposure to 2,3,7,8-TCDD are presented for both land contamination sites and municipal waste incineration. Exposure pathways include soil ingestion, water consumption, beef/dairy ingestion, dermal contact, vapor/particulate inhalation.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation
	Analytical Methods	Sampling	Equivalency Chemicokinetics Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY:
Atomic emission spectrometry for dioxin trace analysis/Emphasis plasma source mass spectrometry

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Joseph A. Caruso 513-475-2263
University of Cincinnati
Department of Chemistry
Cincinnati, OH 45221

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Mike Galvin
National Institute of Environmental Health Sciences

IDENTIFYING NUMBER: 2R01ES03221-04 **STARTING DATE:** 6/1/86 **COMPLETION DATE:** 5/31/89

GOAL/RATIONALE/SCOPE:
Investigation of microwave-induced plasma mass spectrometry as an alternative to conventional MS for the determination of chlorinated dioxins and other halocarbons. The approach will be to utilize the ioizing capabilities of the plasma and couple it as an ion source to the quadrupole MS. The detection levels should drop by a factor of 10 to 100 and be in the fg to pg levels.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 63 K	$ 48 K	$ 50 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
Publications and presentations

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	(Environmental) Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	(Analytical Methods)		Physiologic Genetic 2378 TCDD (TCDD) (PCDD) PCDF (Other Compounds) Standards QA/QC (Methods Research)
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue — Food Animal Human (Environmental) Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY: SYNTHESIS OF PCDD, PCDF, BROMO DD AND DF AND MIXED Br/Cl DD AND DF

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

B. G. CHITTIM
WELLINGTON LABORATORIES
P. O. BOX 1261
291 WOODLAWN ROAD W.
GUELPH, ONTARIO, CANADA N1H 6N6
tel: (519) 822-2436

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

IN HOUSE R & D

IDENTIFYING NUMBER: _____ STARTING DATE: 09/01/86 COMPLETION DATE: 12/31/87

GOAL/RATIONALE/SCOPE:

To prepare individual analytical congeners of PCDDs and PCDFs and other halogenated compounds to be used in analytical and toxicological research.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 10,000 K	$ 30,000 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications in scientific journals concerning physical/chemical properties

Standards to be marketed

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
Photoincorporations of Chlorinated Aromatic Pollutants (CAPs) into Aquatic and Soil Humic Materials (HMs)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Ghulam Ghaus Choudhry
Pesticide Research Laboratory, Department of Soil Science
University of Manitoba, Winnipeg, MB Canada R3T 2N2

Tel: (204) 474-6037

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

The Winnipeg Rh Institute
Winnipeg, MB Canada R3T 2N2

Dr. F.G. Stambrook Tel: (204) 474-9444

IDENTIFYING NUMBER: _____ STARTING DATE: 01/04/85 COMPLETION DATE: Continuing

GOAL/RATIONALE/SCOPE:

Solution phase photochemistry of both ^{13}C-labelled and non-labelled chlorinated aromatic pollutants (CAPs), viz. 1,2,4,5-tetrachlorobenzene, pentachlorophenol, and 1,3,6,8-tetrachlorodibenzo-p-dioxin is extensively being investigated at $\lambda > 290$ nm in the presence of both aquatic and soil humic materials (HMs) in order: (1) to study the photoincorporations of the CAPs into HM macromolecules themselves; and (2) to study the photoincorporation of the CAPs into the photodegradation products of HMs.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 3 K	$ 3 K	$ 3 K	$ 0 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

(a) G.G. Choudhry, J.A. van den Broecke, G.R.B. Webster, and O. Hutzinger: (i) Environ. Toxicol. Chem. 5, 625 (1986), (ii) Chemosphere 16, 495 (1987).

(b) G.G. Choudhry, N.J. Graham and G.R.B. Webster: Can. J. Chem. 65 in press (1987).

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation	Other Compounds
	Analytical Methods	Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research 1,3,6,8-T_4CDD 1,2,3,7-T_4CDD 1,2,3,4,7-P_5CDD 1,2,3,4,7,8-H_6CDD 1,2,3,4,6,7.8-H_7CDD O_8CDD
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:

Environmental Aquatic Photochemistry of Chlorinated Aromatic Pollutants (CAPs)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Ghulam Ghaus Choudhry (204) 474-6037
Pesticide Research Laboratory, Dept. of Soil Science
University of Manitoba, Winnipeg, MB Canada R3T 2N2

+ G.R. Barrie Webster

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Natural Sciences and Engineering Research Council of Canada
200 Kent Street, Ottawa, ON Canada K1A 1H5

Awards Office: Operating Grants
Janet Halliwell (613) 995-5992

IDENTIFYING NUMBER: _____ STARTING DATE: 01/04/87 COMPLETION DATE: 31/03/88

GOAL/RATIONALE/SCOPE: The environmental aquatic photochemistry of several individual isomers of chlorinated aromatic pollutants (CAPs) such as polychlorinated benzenes, phenols, diphenyl ethers, biphenyls (PCBs), and dibenzo-p-dioxins is in progress using radiations of wavelengths $\geq$ 290 nm. Photochemical conditions in the natural waters are being mimicked by conducting photolyses in water containing naturally occurring substances, e.g., acetaldehyde, acetone, fulvic acids, and humic acids along with several humic model monomers. Quantum yields for the products formed through the photoisomerization of CAPs as well as through the photoincorporation of CAPs into added materials (see above) are planned to be determined. Identification and quantification of the photoproducts of CAPs is also in progress.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 5 K	$ 5 K	$ 8 K	$ 0 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

a) G.G. Choudhry et al.: i) Environ. Toxicol. Chem. 5, 625 (1986); ii) Toxicol. Environ. Chem. 13, 27 (1986); Can. J. Chem. 63, 469 (1985).

b) G.G. Choudhry and G.R.B. Webster: i) Chemosphere 15, 1935 (1986): ii) Chemosphere 14, 893 (1985); iii) Chemosphere 14, 9 (1985); iv) Toxicol. Environ. Chem. 9, 291 (1985).

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Quantum yield Degradation products Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research 1,3,6,8-T_4CDD 1,2,3,7-T_4CDD 1,2,3,4,7-P_5CDD 1,2,3,4,7,8-H_6CDD 1,2,3,4,6,7,8-H_7CDD O_8CDD
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:

Environmental Photochemistry of Polychlorinated Diphenyl Ethers in Aquatic Systems.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Ghulam Ghaus Choudhry (204) 474-6037
Pesticide Research Laboratory, Department of Soil Science
University of Manitoba, Winnipeg, MB Canada R3T 2N2

+ G.R.B. Webster

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Research Grants Committee
Office of Research Administration, Room 105 Administration Building
University of Manitoba, Winnipeg, MB Canada R3T 2N2

Dr. F.G. Stambrook Tel: (204) 474-9444

IDENTIFYING NUMBER: _____ STARTING DATE: 01/04/87 COMPLETION DATE: 31/03/88

GOAL/RATIONALE/SCOPE:

In order to quantitatively assess the environmental significance of the presence of environmental pollutants such as polychlorinated diphenyl ethers as well as their photodegradation products in aquatic bodies, photochemical research has been started utilizing our recently proposed (Choudhry and Webster, Residue Rev. 96, 79-136 (1985)) test methods for Environment Canada, Ottawa.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0 K	$ 0 K	$ 3 K	$ 3 K	$? K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
	Destruction	Incineration	Soil	Human
		Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
STORAGE STABILITY STUDY OF CDDs/CDFs IN FISH

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. R.E. Clement (416-235-5896)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213, (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Same as above

IDENTIFYING NUMBER: _____ STARTING DATE: 01/01/87 COMPLETION DATE: 31/03/88

GOAL/RATIONALE/SCOPE:
Storage times of 1-2 years or more are not uncommon before CDD/CDF analysis is performed. This study is designed to test analyte stability and analytical reproducibility over these extended storage times.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ - K	$ - K	$ 87 ~~15~~ K	$ 5 K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report, Journal Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

orking Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCBD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: [bracket one] [A] B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Plant Uptake and Metabolism of Polychlorinated Dibenzodioxin Isomers

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Johne Coates
Midwest Research Institute
Kansas City, MO 64110
(816-732-6327)

NAME, ADDRESS, AND TELEPHONE NUMBER OF SUPPORTING AGENCY (include name of Project Officer):

USEPA, Athens Environmental Research Laboratory
College Station Road
Athens, GA 30613
A. Wayne Garrison (404-546-3145)

IDENTIFYING NUMBER: _____ STARTING DATE: 10/01/84 COMPLETION DATE: 12/31/85

GOAL/RATIONALE/SCOPE: Plants used as cover for hazardous waste sites and other areas where PCDDs may be found may take up and metabolize these compounds. Four PCDD isomers were exposed to rye grass roots through a growth medium; root, exposed plant, and transpired gas samples were collected and analyzed to determine uptake and metabolism.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 45 K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS (e.g., technical reports, other publications, patents):

KEY WORDS [bracket appropriate key words on reverse side]:

KEY WORDS [BRACKET APPROPRIATE KEY WORDS]

Working Group	Select one only	Select one	Select all that apply	
[A]		[Environmental]	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	[Assessment]	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				[PCDD]
				PCDF
		Toxicity	[Bioaccumulation]	Other Compounds
	Properties	Synthesis	[Bioavailability]	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	[Plant]
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY: Lake Ontario TCDD Bioaccumulation Study

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Philip Cook
U.S. EPA
Environmental Research Lab-Duluth
6201 Congdon Blvd
Duluth, MN 55804

Neil Schifrin 617-576-1555
Gradient Corporation
44 Brattle St.
Cambridge, MA 02138

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

U.S. Environmental Protection Agency, Region II, New York, NY -- Christine Beling, 212-264-4183

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IDENTIFYING NUMBER: _____ STARTING DATE: ~~12/1/85~~ COMPLETION DATE: ~~4/1/89~~

GOAL/RATIONALE/SCOPE: Goal is to establish better estimates of bio-uptake of 2,3,7,8-TCDD. These will be applied to estimate flux rates of 2,3,7,8-TCDD at the Hyde Park (Niagra Falls, NY) hazardous waste site. The site is the subject of 2,3,7,8-TCDD risk assessment and remedial investigations/activities.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ -- K	$ -- K	$ 400 K	$ 300 K	$ -- K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents) Reports on uptake and depuration of 2,3,7,8-TCDD in fish; 2,3,7,8-TCDD in Lake Ontario sportfish; 2,3,7,8-TCDD in Lake Ontario sediment; TCDD methodology assessment.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY: The Bioavailability and Physcological effects of Dioxin/Furans on Biovalve Mollusc, Crustaceans, finfish in the Newark Bay Raritan River Estuary.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Keith Cooper (201) 932-3720
Rutgers University
Biochemistry/Microbiology
Cook college
New Burnswick, NJ 08854

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)

Thomas Belton, M.A. (609) 984-6070
N. J. Department of Environmental Protection
Office of Science and Research
401 East State Street, CN-409
Trenton, NJ 08625

IDENTIFYING NUMBER: _____ **STARTING DATE:** 3/1/87 **COMPLETION DATE:** 2/30/88

GOAL/RATIONALE/SCOPE: To study the mechanisms by which PCDD and PCDFs are bioconcentrated and the effects on fecundity for important fishery populations via both in situ and laboratory studies.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 114 K	$ 115 K	$ 100 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

- Technical Reports
- Policy Documents
- Journal Article

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	2378 TCDD TCDD PCDD PCDF Other Compounds
	Analytical Methods			Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: UNITED KINGDOM

TITLE OF PROJECT OR ACTIVITY: DETERMINE RANGE OF BACKGROUND LEVELS OF PCDDs & PCDFs IN SOILS

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. C. Creaser
University of East Anglia
Norwich England
Tel. 0603 56161 x 2009

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Department of the Environment, Hazardous Waste Inspectorate
Romney House, 43 Marsham Street, London SW1P 3PY England
Project Officer E. A. Cox Tel. London 212 6543

IDENTIFYING NUMBER: _____ STARTING DATE: 01/10/85 COMPLETION DATE: 30/05/87

GOAL/RATIONALE/SCOPE:

1. STUDY EXTRACTION & CLEAN-UP METHODS
2. STUDY EFFECTS OF SOIL TYPE ON EXTRACTION EFFICIENCY
3. DEVELOP ANALYTICAL METHODS
4. ASSAY SOIL SAMPLES FROM A !)) km GRID OVER ENGLAND, WALES, AND PART OF SCOTLAND

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 60 K	$ 150 K	$ 100 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Reports
Literature Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: United Kingdom

United Kingdom

TITLE OF PROJECT OR ACTIVITY: HMIP Dioxin Survey

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr Colin Creaser, School of Chemistry, University of East Anglia, Norwich, NR4 7TJ, United Kingdom, Tel 0603 56161

NAME ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

HM Inspectorate of Pollution, 43 Marsham Street, London SW1P 3PY - E.A.Cox Tel London 212 6543

IDENTIFYING NUMBER: _____ STARTING DATE: 1/6/88 COMPLETION DATE: 1/4/90

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GOAL/RATIONALE/SCOPE:

To extend the PCDD/PCDF work to take account of new developing analytical techniques including ion trap, to run more soil samples to improve the database of background PCDD and PCDF levels and to apply more sophisticated computerised statistical techniques to the existing data so far produced in order to gain the maximum information from the complex data produced to date under the existing contract. To investigate the detection of bromo substituted dioxins and furans.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988/9	1989/90
FUNDING	$ — K	$ — K	$ — K	$ 150 K	$ 60 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report

KEY WORDS: (circle appropriate key words on reverse side)

Figure 2

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A *	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Standards QA/QC Methods Research
	Analytical Methods *		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:

AMBIENT AIR MEASUREMENT OF PARTICULATE AND GAS PHASE DIOXIN AND FURAN

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

T. DANN (998-4705)
POLLUTION MEASUREMENT DIVISION
ENVIRONMENT CANADA
RIVER ROAD ENVIRONMENTAL TECHNOLOGY CENTRE
OTTAWA, ONTARIO. K1A 0E7

CO-PRINCIPAL - K. LI (998-3671)
ANALYTICAL SERVICES DIVISION, ENVIRONMENT CANADA
RIVER ROAD ENVIRONMENTAL TECHNOLOGY CENTRE
OTTAWA, ONTARIO. K1A 0E7

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

IDENTIFYING NUMBER: _____ STARTING DATE: 2/12/85 COMPLETION DATE: 31/03/87

GOAL/RATIONALE/SCOPE:

A HIGH VOLUME FILTER/POLYURETHANE FOAM SAMPLING TECHNIQUE WILL BE EVALUATED AS AN AMBIENT AIR COLLECTION TECHNIQUE FOR DIOXINS AND FURANS. SAMPLES FROM MONITORING SITES IN WINDSOR WILL BE ANALYZED OVER THE NEXT YEAR FOR DIOXIN/FURAN.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 2,000 K	$ 2,000 K	$ 15,000 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

A TECHNICAL REPORT DETAILING THE METHODOLOGY AND RESULTS WILL BE PREPARED

KEY WORDS: (circle appropriate key words on reverse side)

ASSESSMENT ENVIRONMENTAL MONITORING PCDD PCDF

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY:
Evaluation of an EPA High-Volume Air Sampler for Polychlorinated Dibenzo-p-Dioxins and Polychlorinated Dibenzofurans

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Fred L. DeRoos, Battelle, Columbus Division, Columbus, OH 43201-2693
(614) 414-4247

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Dr. Robert G. Lewis, U.S. EPA, MDB/MDAD/EMSL
MD-44
Research Triangle Park, NC
(919) 541-3065

IDENTIFYING NUMBER: EPA Contract No. 68-02-4127 **STARTING DATE:** 05/07/85 **COMPLETION DATE:** 05/30/87

GOAL/RATIONALE/SCOPE:

Evaluate an air sampler developed by EPA for pesticides and PCBs to determine applicability to polychlorinated dibenzo-p-dioxins and -furans. Validate sampling/analytical methodology and determine distributions between filter and vapor trap.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 20 K	$ 20 K	$ 0 K	$ 0 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
Technical report (EPA 600/84-86-037) and journal article (Analytical Chemistry, pending).

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Optoacoustic detection of carcinogens

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Gerald J. Diebold
Brown University
Department of Chemistry
Providence, RI 02912

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 ES03810-05 STARTING DATE: 3/1/87 COMPLETION DATE: 2/28/88

GOAL/RATIONALE/SCOPE:

To develop a highly sensitive instrument using the optoacoustic effect, particularly for the detection of 2,3,7,8-TCDD, and to determine its selectivity and sensitivity. In a second approach, the "chemical amplification" of the optoacoustic signal will be investigated.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 121 K	$ 78 K	$ 60 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	(Environmental) Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic (2378 TCDD) TCDD PCDD PCDF Other Compounds Standards QA/QC (Methods Research)
	Properties	Toxicity Synthesis (Physicochemical) Reactivity/Stability Biological Sampling	
	(Analytical Methods)		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: Italy

TITLE OF PROJECT OR ACTIVITY: The Role of Plants in the Environmental Fate of Chlorinated Aromatic and Heteroaromatic Compounds.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Alessandro Di Domenico
(SEE BELOW)

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Istituto Superiore di Sanita'
Viale Regina Elena 299
00161 Rome - Italy (Italy-Rome-) 4990
Ex. 995

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /
IN PROGRESS

GOAL/RATIONALE/SCOPE: Investigation on soil, water, and air-to-plant translocation mechanisms for selected chlorinated aromatic compounds and on their distribution dynamics within the plant study of the capability of plants to act as biological inticators.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

No specific funds available aside from the institue's support

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

-Technical Reports
-Papers

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation Equivalency	
	Analytical Methods	Biological Sampling	Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Determination of PCDDs/PCDFs in Human Milk and Foods

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
ChR Dr. M. Ende, Staatliches Chemisches Untersuchungsamt Oldenburg, Philosophenweg 36, D-2900 Oldenburg, Tel.: 0441/74091

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)
"Land Niedersachsen", hier: Niedersächsischer Sozialminister, Hinrich-Wilhelm-Kopf-Platz 3, D-3000 Hannover, Tel.: 0511/120496

IDENTIFYING NUMBER: -- **STARTING DATE:** 1/1/86 **COMPLETION DATE:** / /

GOAL/RATIONALE/SCOPE:
Investigation of human milksamples by high resolution gas chromatography/high resolution mass spectrometry to ascertain the content of these pollutions today and in the future. This project will be carried out for precautional health protection.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ - K	$ 300.000 K	$ 275.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY: Dioxin Sampling in Missouri

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

U.S. Environmental Protection Agency
Region VII
726 Minnesota Avenue
Kansas City, KS 66101
(913) 236-2800

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

Contact Region VII for the rest of the information.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Uses Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: NIOSH DIOXIN REGISTRY AND COHORT MORTALITY STUDY

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
MARILYN FINGERHUT, PH.D. Phone# 513/841-4411(FINGERHUT)
DAVID MARLOW, INDUSTRIAL HYGIENIST Phone# 513/841-4314(MARLOW)
NATIONAL INSTITUTE FOR OCCUPATIONAL SAFETY AND HEALTH
4676 Columbia Parkway, R-15
Cincinnati, Ohio 45226

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
NATIONAL INSTITUTE FOR OCCUPATIONAL SAFETY AND HEALTH, DIVISION OF SURVEILLANCE, HAZARD EVALUATIONS & FIELD STUDIES, INDUSTRYWIDE STUDIES BRANCH, EPIDEMIOLOGY SECTION I, 4676 Columbia Parkway, R-15, Cincinnati, Ohio 45226
CONTACT: MARILYN FINGERHUT Phone #513/841-4411

IDENTIFYING NUMBER: _____ STARTING DATE: 10/1/79 COMPLETION DATE: 3/3/88

GOAL/RATIONALE/SCOPE:

NIOSH HAS COMPILED DEMOGRAPHIC AND WORK HISTORY INFORMATION FOR ALL U.S. CHEMICAL WORKERS (ABOUT 7,000) POTENTIALLY EXPOSED TO DIOXIN DURING PRODUCTION OF PENTACHLOROPHENOL, 2,4,5-TRICHLOROPHENOL, 2,4,5-TRICHLOROPHENOXYACETICACID & ESTERS OR AMINES. THE DATA ARE BEING USED TO CONDUCT A RETROSPECTIVE COHORT MORTALITY STUDY OF ALL WORKERS.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 294 K	$ 348 K	$ 155 K	$ 155 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

FINAL REPORT DUE MARCH 1988.
THE EPIDEMIOLOGY OF POPULATIONS EXPOSED TO DIOXIN. M.A.FINGERHUT, M.H.SWEENEY, W.E.HALPERIN, T.M.SCHNORR. IN: Solving Hazardous Waste Problems: Dioxins. (ED) JH Exner Amer. Chem. Soc. Symposium Series Book, 1986.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways (Epidemiology) Transport/Mobility Pharmacological	Physiologic Genetic (2378 TCDD) TCDD (PCDD) PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Improving Analytical Methods for PCDDs/PCDFs

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Francke, Institut für organische Chemie, Martin-Luther-King Platz 6, 2000 Hamburg 13
Tel.: 040/41232866; Dr. Zarth, Baubehörde, WSF, Bleichenbrücke 17, 2000 Hamburg 36, Tel.: 040/349132738
(to be contacted for further informations)

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Dr. Nels, Umweltbundesamt, Bismarckplatz 1, 1000 Berlin 33, Tel.: 030/8903-267.
Dr. Zarth, Baubehörde, WSF, Bleichenbrücke 17, 2000 Hamburg 36, Tel.: 040/349132738

IDENTIFYING NUMBER: 1440393 I1 **STARTING DATE:** 1/1/86 **COMPLETION DATE:** 1/1/89

GOAL/RATIONALE/SCOPE:
Development of fast analytical methods on PCDDs/PCDFs for screening purposes; development of improved methods for analysing dioxins especially in oil by using HPLC/HRMS and GC/HRMS.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ - K	$ 200.000 K	$ 200.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Research reports each year

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	(Monitoring)	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	(Analytical Methods)	Biological	Chemicokinetics	QA/QC
		(Sampling)		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources		
	Destruction	Incineration	(Wastes)	Food
		Detoxification	Sludge	Animal
		Physicochemical	Soil	Human
		Biological	Sediment	Environmental
		Environmental	Water	Manufacturing Products
			Air	Plant
	Waste Management	Interim Storage	Tissue	Cell Cultures
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY:

Modelling Clearance of Nonmetabolized Chlorocarbons. (Hexachlorobenzene)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Raymond A. Freeman
Monsanto Company
800 N. Lindbergh Blvd.
St. Louis, MO 63167, USA
(314) 694-6068

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Monsanto Company
(James D. Wilson - (314) 694-8879)

IDENTIFYING NUMBER: _____ **STARTING DATE:** 2/ /87 **COMPLETION DATE:** 10/ /87

GOAL/RATIONALE/SCOPE:

Use hexachlorobenzene data base to develop understanding of rates of excretion of nonmetabolized compounds.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0 K	$ 0 K	$ 50 K	$ 0 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Mathematical model; publication(s)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation Equivalency	Other Compounds Standards
	Analytical Methods	Biological Sampling	Chemicokinetics	QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY:

Comparative Bioavailability of Chlorinated Dioxins in New Jersey and Missouri Soils

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Michael A. Gallo, Director of Toxicology (201) 463-4772
University of Medicine and Dentistry of New Jersey
675 Hoes Lane
Piscataway, New Jersey 08854

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Dr. Frederick W. Kutz (202) 382-5967
Office of Research and Development (RD-682)
U.S. EPA
401 M Street, S.W.
Washington, DC 20460

IDENTIFYING NUMBER: CR 812114 STARTING DATE: 11 / / 84 COMPLETION DATE: 10 / / 87

GOAL/RATIONALE/SCOPE:

The experimental portion of this project is examining the effect of time of contact between TCDD (dioxin) and soil, and differences in soil type, to determine bioavailability. The project is also considering the effects of different bioavailabilities (such as those of Newark and Times Beach soils) on risk assessments as a function of the model employed. This section addresses the question of how bioavailability data should be used in risk assessment to arrive at values that will protect the public health and the environment.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 60 K	$ 37 K	$ 65 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

1985. Umbreit, T.H., D. Patel and M.A. Gallo. Acute Toxicity of TCDD Contaminated Soils from an Industrial Site. Chemoshpere 14: 945-947.
1986. Umbreit, T.H., E.J. Hesse and M.A. Gallo. Bioavailability of Dioxin in Soil from a 2,4,5-T Manufacturing Site. Science 232: 497-499.
1986. Gallo, M.A. et al. Interactive Effects of Estradiol and 2,3,7,8, Tetrachlorodibenzo-p-dioxin on Hepatic Cytochrome P-450 and Mouse Uterus. Toxicology Letters 32: 123-132.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY:

Chlorinated dibenzo-p-dioxins -- Mechanisms of toxicity (rats, mice, guinea pigs)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Thomas A. Gasiewicz
University of Rochester
575 Elmwood Avenue
Rochester, NY 14642

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01ES02859-05 **STARTING DATE:** 6/11/82 **COMPLETION DATE:** 5/31/87

GOAL/RATIONALE/SCOPE:

The overall objective is to better understand the biochemical mechanism(s) by which 2,3,7,8-TCDD and related compounds produce toxicity in animals. The effect of TCDD on nutrient utilization will be studied, alterations in cholesterol metabolism, and the cause of the observed hypoglycemia in TCDD-treated rats.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 69K	$ 74 K	$ 79 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
Chlorinated dibenzo-p-dioxins, mechanisms of toxicity (rats, guinea pigs)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Thomas A. Gasiewicz
University of Rochester
School of Medicine
Rochester, NY 14642

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)
Public Health Service

IDENTIFYING NUMBER: 5P30ES01247-12 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:
Goals are covered under #5R01ES02859-05 and 5R01ES02515-06.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 44K	$ K	$ K	$ K

Salary support only.

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

Physiologic
Genetic

2378 TCDD
TCDD
PCDD
PCDF
Other Compounds

Standards
QA/QC
Methods Research

Food
Animal
Human
Environmental
Manufacturing Products
Plant
Cell Cultures

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Molecular toxicology of TCDD (rats, mice, guinea pigs, hamsters)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Thomas A. Gasiewicz
University of Rochester
River Station
Rochester, NY 14642

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 ES02515-06 STARTING DATE: 1/1/81 COMPLETION DATE: 12/31/91

GOAL/RATIONALE/SCOPE: The overall objective is to understand the biochemical mechanism(s) by which 2,3,7,8-TCDD and related compounds produce toxicity in animals. The receptor molecule will be studied, the kinetics of nuclear translocation of the TCDD-receptor complex in cell-free systems, and the temporal and dose-response relationship between nuclear occupancy of the receptor and the toxicity of TCDD. Similarly, the role of TCDD receptors in the thymus in TCDD-induced thymic atrophy will be determined.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 58 K	$ 80 K	$ 130 K	$ 109 K	$ 116 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological) Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics (Physiologic) Genetic (2378 TCDD) TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	(Properties)	(Toxicity) Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food (Animal) Human Environmental Manufacturing Products Plant (Cell Cultures)
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
Dioxin-epithalial cell interactions - Mechanism and assay

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

John F. Gierthy
New York State Department of Health
Center for Laboratories and Research
Albany, NY 12201

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: ER01 ES03561-02 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:
2,3,7,8-TCDD induces a reversible in-vitro change in post confluent cell proliferation and morphology of a cell line derived from a keratinizing cell line cloned from a mouse teratoma. This system has potential for use as an assay for samples including air, soil, sediment, fish, soot, surfaces, and water. Also investigated will be the mechanism of dioxin-like activity by studying various aspects of the flat-cell effect using 2,3,7,8-TCDD.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 70 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	Assessment	(Environmental)	Monitoring	(Physiologic)
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	(2378 TCDD)
		Effects	(Pharmacological)	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	(Analytical Methods)	Biological	Chemicokinetics	QA/QC
		Sampling		(Methods Research)
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	(Wastes)	Food
			Sludge	(Animal)
	Destruction	Incineration	(Soil)	Human
		Detoxification	(Sediment)	Environmental
		Physicochemical	(Water)	Manufacturing Products
		Biological	(Air)	Plant
		Environmental	Tissue	(Cell Cultures)
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** CANADA

TITLE OF PROJECT OR ACTIVITY: Relationship between physico-chemical properties and bioaccumulation of PCDDs in Aquatic Organisms

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR: Frank, A.P.C. Gobas, Department of Chemical Engineering and Applied Chemistry, University of Toronto, Toronto, Ontario, Canada, M5S-1A4

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)

IDENTIFYING NUMBER: _____ **STARTING DATE:** / / **COMPLETION DATE:** / /

GOAL/RATIONALE/SCOPE: In order to establish the factors that affect the uptake and bioaccumulation of PCDDs in fish and other aquatic organisms we focus our attention on (1) metabolic transformation of PCDDs in fish, (2) bioavailability of PCDDs to fish, (3) the role of molecular properties i.e. K_{ow}, molar volume, molecular dimensions on uptake kinetics, membrane permeation and lipid solubility.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ ~~5000~~ K	$ ~~5000~~ K	$ ~~5000~~ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Shiu, W.Y., Doucette, W., Gobas, F.A.P.C., Andren, A. and Mackay, D., Environ.Sci.Technol. in press

Gobas, F.A.P.C., Shiu, W.Y., Opperhuizen, A. and Mackay, D., Chemosphere 15 , 1986, 1985-1986.

Opperhuizen, A., Wagenaar, W.J., Van der Wielen, F.W.M., Van den Berg, M., Olie, K. and Gobas, F.A.P.C., Chemosphere 15 , 1986, 2049-2054.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	(Assessment)	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY: RE-EVALUATION OF PCDDS IN FOODS

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. D.L. Grant (957-1315)/J. Salminen (957-1825), Food Directorate, Health Protection Branch, Health and Welfare Canada, Ottawa, Ontario. K1A 0L2

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Same as above

IDENTIFYING NUMBER: N/A STARTING DATE: 1 / 1 / 86 COMPLETION DATE: 1 / 1 / 88

GOAL/RATIONALE/SCOPE:

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ - K	$ 5,000 K	$ Unknown K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Food and Drugs Act and Regulations

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	(Assessment)	Environmental Exposure Body Burden (Risk) Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD (PCDD) PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Standards QA/QC Methods Research
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue (Food) Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY:
Analytical Determination of 2,3,7,8-TCDD, 2,3,7,8-TCDF, and their Congeners in River and Bay Sediments

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. Michael Gross
Midwest Center for Mass Spectrometry
University of Nebraska
Lincoln, Nebraska
(402) 472-2794

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)
Fredrika C. Moser
Office of Science and Research
NJ Dept. of Environmental Protection (609) 984-6070
401 E. State St., CN-409
Trenton, NJ 08625

IDENTIFYING NUMBER: 43852 **STARTING DATE:** 07/29/86 **COMPLETION DATE:** 07/01/88

GOAL/RATIONALE/SCOPE: Analysis of sediment samples from Newark Bay system, NJ for 2,3,7,8-TCDD, TCDF and total quantities of all congeners penta thru octachlorinated dioxin. Sediment samples selected from core sections collected in Newark Bay, Passaic and Hackensack Rivers by researchers at Lamont Doherty Geologic Observatory, Columbia University. Selection is based on ^{137}Cs dating and pesticide (PCB analyses conducted by Dr. Richard Bopp, Columbia University.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 30,000 K	$ 25,479 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents): Anticipated
- Refereed journal article
- Policy paper for NJ Dept. of Environmental Protection

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Standards QA/QC Methods Research
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: Sweden

TITLE OF PROJECT OR ACTIVITY:

Structure and functions of the TCDD receptors (rats)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Jan-Ake Gustafsson
Huddinge Univ. Hospital, F69
Department of Medical Nutrition
S-141 86 Huddinge, Sweden

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: IR01 ES03954-01 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

To investigate in depth the biochemistry and molecular biology of the receptor for TCDD. More specifically, the receptor will be purified and the structural requirements for ligand-receptor interaction will be studied, TCDD receptor-DNA interaction will be studied, and TCDD receptor cDNA and gene will be isolated and cloned.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 68 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) ~~B~~ ~~C~~ **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Studies on Pharmacokinetics and Toxicology of a PCDD/PCDF Mixture at Rodents and Primates

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Prof. Dr. H. Hagemaier, Institut für organische Chemie der Universität Tübingen, Auf der Morgenstelle 18, 7400 Tübingen, (07071)29-2099

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Gesellschaft für Strahlen- und Umweltforschung mbH München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089)3187-3372 (Dr. Ende)

IDENTIFYING NUMBER: 07 VDX 02 **STARTING DATE:** 01 / 04 / 87 **COMPLETION DATE:** 31 / 01 / 91

GOAL/RATIONALE/SCOPE:
production of defined PCDD/PCDF mixtures by catalytic dechlorination of OCDD/OCDF for pharmacokinetic studies

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 129 K	$ 129 K	$ 129 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

reports, publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
	Destruction	Incineration	Soil	Human
		Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Content of PCDD/PCDF in Selected Soils, Sediments and Plants

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. H. Hagenmaier, Auf der Morgenstelle 18, D-7400 Tübingen, Tel.: 07071/292099

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Umweltbundesamt, Bismarckplatz 1, D-1000 Berlin 33, G. Bachmann, Tel.: 030/8903-641

IDENTIFYING NUMBER: 107 01 010 **STARTING DATE:** 1/11/85 **COMPLETION DATE:** 7/10/8

GOAL/RATIONALE/SCOPE:
Monitoring of soils after application of sewage sludge at six different places. Analytical methods.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 20.000 K	$ 90.000 K	$ 50.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		(Environmental Exposure)	Monitoring	Physiologic
	Assessment	Body Burden	Pathways	Genetic
		Risk	Epidemiology	
		Effects	Transport/Mobility	2378 TCDD
			Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	(Analytical Methods)	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
	Sources	Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	(Sediment)	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	(Plant)
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B (C) **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:

Study on PCDD and PCDF in the Environment

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. H. Hagenmaier, Auf der Morgenstelle 18, D-7400 Tübingen, Tel.: 07071/292099

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Landwirtschaftsministerium Baden-Württemberg

IDENTIFYING NUMBER: _____ **STARTING DATE:** 1/7/84 **COMPLETION DATE:** 1/6/86

GOAL/RATIONALE/SCOPE:

Study of level of PCDD/PCDF in the following matrices: soil, sewage sludge, river sediments; starting products and wastes of a chemical manufacturer; leachate from several landfills; Pentachlorophenol; Waste oils; specific analyses of PCDD/PCDF isomers in these samples.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 100.000 K	$ 100.000 K	$ - K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) xxxxxxxxx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Study of Dioxins and Furanes in Selected Soils, Plants and Sediments

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Hannspaul Hagenmeier, Universität Tübingen, Auf der Morgenstelle 18,
7400 Tübingen, (07071)29 20 99

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Umweltbundesamt, Bismarckplatz 1, 1000 Berlin 33, (030) 8903-270, (Dr. R. Mach)

IDENTIFYING NUMBER: 107 01 010 **STARTING DATE:** 1/12/85 **COMPLETION DATE:** 30/11/87

GOAL/RATIONALE/SCOPE:

Contamination of soils etc by different sources of dioxins, development of PCDD/PCDF analytics

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ 14 K	$ 108 K	$ 108 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical reports

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** U.S.A.

TITLE OF PROJECT OR ACTIVITY:

Validation on Emission Test Method for Dioxins

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Clarence L. Haile (816) 753-7600
Midwest Research Institute
425 Volker Blvd.
Kansas City, MO 64110

Dr. Marcus Cooke (614) 424-5024
Battelle, Columbus Division
505 King Avenue
Columbus, OH 43201

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Jimmy C. Pau and Joseph E. Knoll Pau - (919) 541-3680; Knoll - (919) 541-2952
EMSL-RTP/QAD/Source Branch (MD-77A)
U.S. Environmental Protection Agency
Research Triangle Park, NC 27711

IDENTIFYING NUMBER: DU: A101-C17-NMH03 **STARTING DATE:** 11/1/85 **COMPLETION DATE:** 9/30/89

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GOAL/RATIONALE/SCOPE:

To determine the precisions and accuracies of the sampling, extraction/cleanup, and analysis of dioxins from stationary source emissions.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 250 K	$ 235 K	$ 325 K	$ 200 K	$ 200 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Interim reports, final report, and Journal articles.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	2378 TCDD TCDD PCDD PCDF Other Compounds Standards
	Analytical Methods	Sampling		QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Development of health criterion document

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

John Hawley
NYS Dept. of Health
Albany, NY 12237 518-473-7542

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Same as above

IDENTIFYING NUMBER: _____ STARTING DATE: / /84 COMPLETION DATE: 10 / /87

GOAL/RATIONALE/SCOPE: Review toxicology and exposure routes. Estimate health risks associated with TCDD air emissions.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Comparison of the toxicity of selected dibenzodioxins and dibenzofurans and determination of the toxicity of mixtures of these compounds

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Th. Helder, Department of Veterinary Pharmacology, Pharmacy and Toxicology
State University of Utrecht, P.O. Box 80176, 3508 TD UTRECHT
tel. (30) 732714

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Ministry of Housing, Physical Planning and Environment, P.O. Box 450, 2260 MB LEIDSCHENDAM
Dr. J.A. van Zorge
tel. (70) 209367 ext. 2840

IDENTIFYING NUMBER: BWS 1123 **STARTING DATE:** 01 /04 /86 **COMPLETION DATE:** 01 /10 /87

GOAL/RATIONALE/SCOPE: Comparison of the toxicity of selected dioxins and dibenzofurans with the toxicity of 2,3,7,8-TCDD in the rainbow trout early lifestage bio-assay for the determination of toxicity equivalence factors (TEF). Study of the toxicity of mixtures of these compound and of mixtures of selected pcb's with dioxins and dibenzofurans.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 60 K	$ 44 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical reports and publications in scientific journals

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Toxicity of fly-ash and flue gas

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Th. Helder, Department of Veterinay Pharmacology, Pharmacy and Toxicology
State University of Utrecht, P.O. Box 80176, 3508 TD UTRECHT
tel. (30) 732714

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Ministry of Housing, Physical Planning and Environment, P.O. Box 450, 2260 MB LEIDSCHENDAM
Dr. J.A. van Zorge
tel. (70) 209367 ext. 2840

IDENTIFYING NUMBER: BWS 2527409 **STARTING DATE:** 01 /04 /87 **COMPLETION DATE:** 01 /09 /87

GOAL/RATIONALE/SCOPE: Determination of the toxicity of extracts of several samples of fly-ash and flue gas in toxic equivalents of 2,3,7,8-TCDD in the rainbow trout early lifestage bio-assay.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1.000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 20 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report and publication in scientific journal

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) ~~x~~ ~~x~~ ~~x~~ **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Changes of the Immunosystem and Induction of Monooxygenases upon Exposure to Dioxins

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Dr. H. Helge, Institut für Toxikologie und Embryonalpharmakologie der Freien Universität Berlin, Garystr. 5, 1000 Berlin 33, (030)838-3195

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Gesellschaft für Strahlen- und Umweltforschung mbH München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089)3187-3372 (Dr. Ende)

IDENTIFYING NUMBER: 07 65 002 **STARTING DATE:** 01/10/87 **COMPLETION DATE:** 30/09/90

GOAL/RATIONALE/SCOPE: The influence of PCDD/PCDF load on the function of the immunosystem shall be studied by means of clinical and experimental testing in order to permit risk assessment for humans.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 189 K	$ 441 K	$ 441 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure	Monitoring	Physiologic
		Body Burden	Pathways	Genetic
		Risk	Epidemiology	
		Effects	Transport/Mobility	2378 TCDD
			Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
	Destruction	Incineration	Soil	Human
		Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY:
Background Population Levels of Selected PCDDs/PCDFs

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. Frederick D. Hileman
Monsanto Company
800 N. Lindbergh Blvd.
St. Louis, MO 63167, USA
(314) 694-1275

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)
Monsanto Company
(James D. Wilson - (314) 694-8879)

IDENTIFYING NUMBER: _____ **STARTING DATE:** 4 / / 84 **COMPLETION DATE:** 12 / / 86

GOAL/RATIONALE/SCOPE:
Understand background exposure to PCDD/PCDFs.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 40 K	$ 25 K	$ 0 K	$ 0 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
Technical publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY:
Atmospheric Exposures of Man to Combustion Generated Chlorinated Dioxins and Dibenzofurans

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. Ronald A. Hites, School of Public & Environmental Affairs, Indiana University, Bloomington, IN 47405

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)
Dr. Nancy K. Wilson, U.S. EPA
MD-44, MDB/MDAD/EMSL
Research Triangle Park, NC 27711
(919) 541-4723

IDENTIFYING NUMBER: CAG No. CR812588-01 **STARTING DATE:** 04 / 03 / 87 **COMPLETION DATE:** 04 / 02 / 90

GOAL/RATIONALE/SCOPE:
High Volume air sampling will be performed in and around the Bloomington, IN area and at other sites in the Lower Great Lakes region to determine concentrations and distributions of chlorinated dibenzo-p-dioxins and furans. Attempts will be made to relate findings to combustion sources. Methodologies will also be evaluated.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 111 K	$ 115 K	$ 115 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
Technical Reports and Journal Articles

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Establishment and maintenance of an international register of persons exposed to phenoxy acid herbicides and contaminants, Phase II

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

David G. Hoel 919-541-3433
NIEHS/Biometry and Risk Assessment Program
P.O. Box 12233
Research Triangle Park, NC 27709

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

In-house project

IDENTIFYING NUMBER: N01-ES-1-5009 STARTING DATE: / / 87 COMPLETION DATE: / / 88

GOAL/RATIONALE/SCOPE:

To collect data using detailed, standardized protocols, developed by IARC in conjunction with study collaborators and maintained by IARC staff. Presents opportunity to analyze data on human exposure and resulting potential health effects.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 40 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

n/a

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
DEVELOPMENT OF AUTOMATED LARGE-VOLUME WATER SAMPLING METHODS USING SORBENT CARTRIDGES

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Professor B. Hollebone (613-564-2760)
Carleton University
Department of Chemistry
Ottawa, Canada K1S 5B6

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Ms. H.M. Tosine (416-235-5906)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: _____ STARTING DATE: 01/04/86 COMPLETION DATE: 30/03/88

GOAL/RATIONALE/SCOPE:

Develop automated sampling device using XAD-2 sorbent cartridges to sample 100L of raw/treated water from water treatment plants. Use device for routine field monitoring.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 110 K	$ 45 K	$ 10 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report, Journal Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

orking Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods	Sampling		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Immunotoxicology by chlorinated dibenzo-p-dioxins (mice)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Michael P. Holsapple
Virginia Commonwealth University
Box 613, MCV Station
Richmond, VA 23298

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 2 R01 ES02520-04A1 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

To study the dose-related 2,3,7,8-TCDD and 2,3-DCDD suppression of antibody production following subchronic exposure or direct exposure with cultured splenocytes from untreated mice.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 82 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

Physiologic Genetic	2378 TCDD TCDD PCDD PCDF Other Compounds	Standards QA/QC Methods Research
Food Animal Human Environmental Manufacturing Products Plant Cell Cultures		

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
ROUTINE AND EMERGENCY MONITORING OF DRINKING WATER SUPPLIES FOR CDDs/CDFs

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Mr. R. Hunsinger (416-323-4874)
Ontario Ministry of Environment
Water Resources Branch
1 St. Clair Ave. W., 3rd Floor
Toronto, Ontario CANADA M4V 1K6

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)
Ms. H. Tosine (416-235-5906)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /
ONGOING PROGRAM

GOAL/RATIONALE/SCOPE:
Routine monitoring of raw/treated drinking water from Ontario water treatment plants.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 100 K	$ 150K	$ 150 K	$ 75 K	$ 75 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
Technical Reports, Journal Publications.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

orking Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds
	Analytical Methods	Sampling		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: Half-Life of Chemicals in Soil

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Ms. Roxanne Huskol 513-782-4700
PEI Assoc., Inc.
11499 Chester Road
Cincinnatti, OH 45246

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)
U.S. Environmental Protection Agency
Environmental Monitoring Systems Lab
P.O. Box 15027
Las Vegas, NV 89114
Dr. Charles Nauman 702-798-2258

IDENTIFYING NUMBER: 68-02-3976, 68-02-4248 STARTING DATE: 01/01/85 COMPLETION DATE: 01/01/86

GOAL/RATIONALE/SCOPE: The objective of this project is to provide guidance for estimating the environmental half-life of selected toxic persistent and semipersistent chemicals which tend to be tightly adsorbed to soil. This is one area where our lack of knowledge is hindering the development of exposure assessments with low levels of uncertainty. The project report will provide guidance relative to nine groups of compounds which may contaminate soil, including halogenated dibenzo-p-dioxins and dibenzofurans.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 27.0 K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

U.S. EPA, 1986. Fate and Persistence in Soil of Selected Toxic Organic Chemicals. Final Report, 12/86

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds
	Analytical Methods	Sampling		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) ~~B~~ EX **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Development of new Analytical Methods by Use of a New Analytical System for the Study of Samples with a Complex Matix for PCDD/PCDF

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Dr. O. Hutzinger, Lehrstuhl für Ökologische Chemie und Geochemie der Universität Bayreuth, Universitätsstraße 30, 8580 Bayreuth

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Gesellschaft für Stahlen- und Umweltforschung mbH München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089) 3187-3372 (Dr. Ende)

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IDENTIFYING NUMBER: 0764006 **STARTING DATE:** 01/01/88 **COMPLETION DATE:** 30/06/90

GOAL/RATIONALE/SCOPE:
Coupling of high-resolution mass spectrometer with a new special high-resolution mass-spectrometer (MS/MS-System); use of a complex sample matrix; trace analysis in the ppt-area

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ 504 K	$ 269 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Standards QA/QC Methods Research
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) ~~B~~ ~~C~~ **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Study of Pharmacokinetics and Toxicology of 2,3,7,8-TBrDf, 1,2,3,7,8-PBrDD and 2,3,4,7,8-PBrDF at Rodents - Analysis of Organs for the Mentioned Isomeres

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Prof. Dr. Hutzinger, Lehrstuhl für Ökologische Chemie und Geochemie der Universität Bayreuth, Universitätsstraße 30, 8580 Bayreuth, (0921)552-254

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Gesellschaft für Strahlen- und Umweltforschung mbH München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089)3187-3372 (Dr. Ende)

IDENTIFYING NUMBER: 07VDX03 **STARTING DATE:** 01/01/88 **COMPLETION DATE:** 31/12/88

GOAL/RATIONALE/SCOPE:

On the basis of pharmacokinetic-analytical and toxicological studies one will try to gain first indications for the risk assessment of these substances.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ 101 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Figure 2

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	
	Analytical Methods	Sampling		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: Netherlands

TITLE OF PROJECT OR ACTIVITY: Development of a chemoluminescent immunoassay for chlorinated dioxins ans furans

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. ir. E.H.J.M. Jansen, National Institute of Public Health and Environmental Hygiene
P.O. Box 1, 3720 BA BILTHOVEN
tel. (30),742940

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

IDENTIFYING NUMBER: 378707 STARTING DATE: 01 /03 /87 COMPLETION DATE: 01 /06 /88

GOAL/RATIONALE/SCOPE: see title

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 42 K	$ 40 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

internal reports and publications in international journal

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
FISH CONTAMINANTS PROGRAM

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Mr. A. Johnson (416-323-4927)
Ontario Ministry of Environment
Water Resources Branch
1 St. Clair Ave. W., 4th Floor
Toronto, Ontario, CANADA M4V 1K6

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Mr. Brian Bobbie (416-235-5890)
Ontario Ministry of Environment
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: _____ STARTING DATE: ___/___/___ COMPLETION DATE: ___/___/___
ONGOING PROGRAM

GOAL/RATIONALE/SCOPE:
Contaminant monitoring program for 2,3,7,8-TCDD in Ontario sports fish.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 75K K	$ 40K K	$ 200 K	$ 200 K	$ 200 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Guide to Eating Ontario Sport Fish

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

orking Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: [bracket one] [A] B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Uptake of 2,3,7,8-TCDD by Dairy Cows

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Daniel H. Jones
Texas A&M University
College Station, TX 77843
(409-845-5959)

NAME, ADDRESS, AND TELEPHONE NUMBER OF SUPPORTING AGENCY (include name of Project Officer):

USEPA, Corvallis Environmental Research Laboratory
200 SW. 35th Street
Corvallis, OR 97333
Jay D. Giles (503-757-4736)

IDENTIFYING NUMBER: CR 812614 STARTING DATE: 07/16/85 COMPLETION DATE: 12/31/87

GOAL/RATIONALE/SCOPE: 1) Isolation and identification of 2,3,7,8-TCDD metabolites in the ruminant; 2) determination of the pharmacokinetics, metabolism, and biological effects of TCDD in the ruminant; and 3) determination of the bioavailability of 2,3,7,8-TCDD from soil and its uptake by dairy cows and translocation to milk, meat, and waste products.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 101 K	$ 101 K	$ 55 K	$ K	$ K

MAJOR OUTPUTS (e.g., technical reports, other publications, patents):

Jones, Daniel H., et al., Bioavailability of 2,3,7,8-TCDD administered to Holstein dairy cows. Chemosphere (submitted)

KEY WORDS [bracket appropriate key words on reverse side]:

KEY WORDS [BRACKET APPROPRIATE KEY WORDS]

Working Group	Select one only	Select one	Select all that apply
A	[Assessment]	Environmental [Exposure] Body Burden Risk Effects	Monitoring [Pathways] Epidemiology Transport/Mobility [Pharmacological]
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation [Bioavailability] Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Physiologic Genetic [2378 TCDD] TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

The role of activated oxygen in the toxic damage produced by 2,3,7,8-TCDD.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Peter Kahn (201) 932-9255
Biochemistry-Microbiology Department
Cook College
Rutgers University
New Brunswick, New Jersey 08903

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Dr. Gloria Post (609) 292-8497
NJ Department of Environmental Protection
Office of Science and Research
CN 409
Trenton, New Jersey 08625

IDENTIFYING NUMBER: C29528 STARTING DATE: 4/15/86 COMPLETION DATE: 8/30/87

GOAL/RATIONALE/SCOPE: TCDD causes non-specific damage to many organs. Although it is a potent mixed-function oxidase inducer, TCDD is a poor substrate for mixed function oxidase enzymes. TCDD has been observed to induce proliferation of peroxisome in Syrian golden hamster liver. The above observations suggest that dioxin toxicity might result, in part, from the generation of activated oxygen upon binding of TCDD to mixed function oxidase. The contract will support research on the proposed mechanism of 2,3,7,8-TCDD toxicity in mammlian systems.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$24,000 K	$ 24,000 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publication of results in appropriate Toxicology Journal is expected.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: US

TITLE OF PROJECT OR ACTIVITY: Vietnam Veterans Mortality Study

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Han K. Kang
Office of Environmental Epidemiology (202)653-1891
Veterans Administration
1730 K St, N.W. Riddell Bldg. Room 401 Wash.D.C. 20006-3868

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Same as above.

IDENTIFYING NUMBER: _____ STARTING DATE: 7/1/83 COMPLETION DATE: 12/1/86

GOAL/RATIONALE/SCOPE:

To assess mortality patterns of U.S. servicemen in the Army or Marine Corps who served in Vietnam.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 600 K	$ 600 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

scientific publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways (Epidemiology) Transport/Mobility Pharmacological
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

Physiologic
Genetic

2378 TCDD
TCDD
PCDD
PCDF
Other Compounds

Standards
QA/QC
Methods Research

Wastes
Sludge
Soil
Sediment
Water
Air
Tissue

Food
Animal
Human
Environmental
Manufacturing Products
Plant
Cell Cultures

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.

TITLE OF PROJECT OR ACTIVITY: Women Vietnam Veterans Health Study

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Han K. Kang, Dr. P.H. (202) 653-1891
Office of Environmental Epidemiology
Veterans Administration
1730 K St, N.W. Riddell Bldg. Room 401 Wash. D.C. 20006-3868

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Han K. Kang, Dr. P.H. (202) 653-1891
Office of Environmental Epidemiology
Veterans Administration
1730 K St, N.W. Riddell Bldg. Room 401 Wash. D.C. 20006-3868

IDENTIFYING NUMBER: _____ STARTING DATE: 10/1/86 COMPLETION DATE: 7/30/90

GOAL/RATIONALE/SCOPE:

To assess any long-term adverse health effects (particularly gender specific health effects) experienced by women Vietnam veterans.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0 K	$ 180 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

scientific publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways (Epidemiology) Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** U.S.

TITLE OF PROJECT OR ACTIVITY:

VA/AFIP Case Control Study of Soft Tissue Sarcoma

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Han K. Kang, Dr. P.H. (202) 653-1891
Office of Environmental Epidemiology
Veterans Administration
1730 K St., N.W. Riddell Bldg. Room 401 Wash. D.C. 20006-3868

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Han K. Kang, Dr. P.H. (202) 653-1891
Office of Environmental Epidemiology
Veterans Administration
1730 K St, N.W. Riddell Bldg. Room 401 Wash. D.C. 20006-3868

IDENTIFYING NUMBER: _____ **STARTING DATE:** 7/1/83 **COMPLETION DATE:** 10/1/86

GOAL/RATIONALE/SCOPE:

To determine the relationship of Vietnam service, probable Agent Orange exposure and other factors to the risk of developing soft tissue sarcoma.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 150 K	$ 150 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

scientific publication

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.

TITLE OF PROJECT OR ACTIVITY:

Soft Tissue Sarcoma and Military Service in Vietnam

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Han K. Kang, Dr. P.H. (202) 653-1891
Office of Environmental Epidemiology
Veterans Administration
1730 K St, N.W. Riddell Bldg. Room 401 Wash. D.C. 20006-3868

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Han K. Kang, Dr. P.H. (202) 653-1891
Office of Environmental Epidemiology
Veterans Administration
1730 K St, N.W. Riddell Bldg. Room 401 Wash. D.C. 20006-3868

IDENTIFYING NUMBER: _____ STARTING DATE: 5/1/83 COMPLETION DATE: 2/1/86

GOAL/RATIONALE/SCOPE:

To examine the association between previous service in Vietnam and the risk of soft tissue sarcoma.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 230 K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Journal of Occupational Medicine, 18, 1215-1218, 1986

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.

TITLE OF PROJECT OR ACTIVITY: Retrospective Study of Dioxins and Furans in Adipose Tissue

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Han K. Kang, Dr. P.H. (202) 653-1891
Office of Environmental Epidemiology
Veterans Administration
1730 K St., N.W. Riddell Bldg. Room 401 Wash., D.C. 20006-3868

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Same as above

IDENTIFYING NUMBER: _____ STARTING DATE: 5/1/83 COMPLETION DATE: 3/1/88

GOAL/RATIONALE/SCOPE: To determine if service in the military, especially in Vietnam has resulted in increased levels of these compounds.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 240 K	$ 200 K	$ 260 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

scientific publications.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY: DEVELOPMENT OF EFFECTIVE AND RAPID CLEANUP PROCEDURES FOR THE ANALYSIS OF DIOXINS/FURANS IN FISH AND OTHER BIOTA

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Prof. F.W. Karasek (519-885-1211 Ext. 3423)
Department of Chemistry
University of Waterloo
Waterloo, Ontario, CANADA N2L 3G1

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Dr. R.E. Clement (416-235-5896)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: RAD Project 210 RR STARTING DATE: 20/06/85 COMPLETION DATE: 30/03/87

GOAL/RATIONALE/SCOPE:

Use HPLC to develop a rapid and effective cleanup for CDDs/CDFs in the presence of high levels of PCBs and other potential interferences, and to collect sufficient HPLC fractions to enable the analysis of a wide range of target substances in fish extracts.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 25 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report, Journal Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	~~Environmental~~	Monitoring	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources		
	Destruction	Incineration	Wastes	Food
		Detoxification	Sludge	Animal
		Physicochemical	Soil	Human
		Biological	Sediment	Environmental
		Environmental	Water	Manufacturing Products
			Air	Plant
			Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
Methodology For Complete Analysis Of Complex Mixtures

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. F.W. Karasek (519-885-1211 Ext. 3423)
Department of Chemistry
University of Waterloo
Waterloo, Ontario, CANADA N2L 3G1

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)
Dr. R.E. Clement (416-235-5896)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: RAC Grant 216 PL STARTING DATE: / / COMPLETION DATE: 30/03/87

GOAL/RATIONALE/SCOPE:
Analyze complex environmental samples for a complete range of organic substances including CDDs/CDFs by application of HPLC fractionation and GC-MS techniques.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 18 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

orking Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
Procedure for the 2,3,7,8 - Substituted analysis of PCDD, PCDF, and other target compounds in environmental samples.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Professor F.W. Karasek (519-885-1211 Ext. 3423)
Chemistry Department
University of Waterloo
Waterloo, Ontario, Canada N2L 3G1

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Project Officer - Dr. C. Tashiro (416-235-5897)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, Canada M9W 5L1

IDENTIFYING NUMBER: _____ STARTING DATE: 01/04/87 COMPLETION DATE: 30/03/88

GOAL/RATIONALE/SCOPE:

Develop HPLC procedures for analysis of complete range of toxic organics in difficult environmental samples, including all 2,3,7,8 - substituted CDDS/CDFS.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 50 K	$ 20 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report, Journal Publication

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

orking Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	2378 TCDD TCDD PCDD PCDF Other Compounds
	Analytical Methods	~~Sampling~~		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Alterations in cell surface marker expression by dioxins (mice)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Nancy I. Kerkvliet
Oregon State University
College of Veterinary Medicine
Corvallis, OR 97331

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 1R01 ES03966-01 STARTING DATE: 5/1/86 COMPLETION DATE: 4/30/89

GOAL/RATIONALE/SCOPE: To investigate whether activation of the Ah gene produces altered surface antigen or receptor expression which, in turn, alters the functional activity of the cell. Specific aims are (1) to characterize lymphocyte/monocyte subpopulations in control and dioxin-treated mice in terms of cell surface marker expression, (2) to characterize relative changes in lymphocyte/monocyte subpopulations following antigen challenge, and (3) to determine if in vitro exposure of lymphocyte/monocyte subsets to dioxin produces similar alterations in surface antigen expression observed after in vivo exposure.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 130 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)		Environmental	Monitoring	(Physiologic)
		Exposure	Pathways	Genetic
	(Assessment)	Body Burden	Epidemiology	
		Risk	Transport/Mobility	(2378 TCDD)
		(Effects)	(Pharmacological)	TCDD
				(PCDD)
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		(Methods Research)
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	(Animal)
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	(Cell Cultures)
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Epidemiological study

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Dr. Konietzko, Institut für Arbeits- und Sozialmedizin
Universität Mainz, Obere Zahlbacherstraße 67, D-6500 Mainz, Tel.: 06131-17-3235

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Berufsgenossenschaft der chemischen Industrie, Gaisbergstraße 11, D-6900 Heidelberg,
Tel.: 06221-5230

IDENTIFYING NUMBER: V **STARTING DATE:** 1/12/84 **COMPLETION DATE:** 1/12/86

GOAL/RATIONALE/SCOPE:
Correlation of morbidity and professional impact

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 250 K	$ 210 K	$ _ K	$ _ K	$ _ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

reports

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	
	Analytical Methods			Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) xR xO **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Immune-toxicological Stduy of Exposed Persons for Effects of Halogenated Dioxins and Related Compounds - Allergologic Studies

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Dr. W. König, Lehrstuhl für allgemeine und Umwelthygiene der Universität Bochum, Universitätsstraße 150, 4630 Bochum 1, (0234) 700 6467

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Gesellschaft für Stahlen- und Umweltforschung mbH, München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089) 3187-3372 (Dr. Ende)

IDENTIFYING NUMBER: 0764 400 3B **STARTING DATE:** 01 / 01 / 88 **COMPLETION DATE:** 31 / 12 / 89

GOAL/RATIONALE/SCOPE:
It should be verified if persons charged with PCDD/PCDF have an inclination to allergic and pseudo-allergic reactions.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ 153 K	$ 153 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden ~~Risk~~ Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) (B) (C) COUNTRY OF ORIGIN: Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Thermolysis of products containing halogenated organic compounds

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Dr. F. Korte, Gesellschaft für Strahlen- und Umweltforschung mbH, Institut für Ökologische Chemie, D-8042 Neuherberg

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

IDENTIFYING NUMBER: 75132 STARTING DATE: 1 /1 /82 COMPLETION DATE: 31 /12 /88

GOAL/RATIONALE/SCOPE:
Formation of 2,3,7,8-TCDD during thermolytic processes from halogenated organic compounds.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 100.000 K	$ 80.000 K	$ 80.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Prof. Korte, Dr. Bahadir, Dr. Bienick: "Ökologisch chemische Aspekte der Abfallwirtschaft", GSF-Bericht 16/85
Prof. Korte: Ecological chemistry: State of the art, GSF-Bericht Ö-820
Dr. E.S. Lahaniatis, Dr. E. Clausen, Dr. D. Bienick, Prof. F. Korte: Bildung von 2,3,7,8-TCDD bei der Thermolyse von ausgewählten chlorierten organischen Verbindungen, Chemosphere, Vol. 14, No. 2, pp 233-238, 1985

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability ~~Biological~~ Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY: Development of Analytical Methods for the Measurement of PCDD/PCDF in Environmental Samples.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

R.C. Lao (613) 998-3671
River Road Environmental Tech. Centre
Ottawa, Ontario (Canada)
K1A 1C8

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Same as above.

IDENTIFYING NUMBER: _____ STARTING DATE: 01 / 01 / 85 COMPLETION DATE: 12 / 31 / 87

GOAL/RATIONALE/SCOPE: To refine and update the analytical procedures for the determination and measurement of PCDD/PCDF and related halogenated compounds in samples from various environmental sources.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 20,000 K	$ 20,000 K	$ 20,000 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** CANADA

TITLE OF PROJECT OR ACTIVITY:

Determination of Physico-Chemical Properties of PCDD/PCDF

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

R.C. Lao (613) 998-3671
River Road Environmental Tech. Centre
Ottawa, Ontario (Canada) K1A 1C8

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Same as above.

IDENTIFYING NUMBER: _____ **STARTING DATE:** 07/01/86 **COMPLETION DATE:** 12/31/87

GOAL/RATIONALE/SCOPE: To determine the key parameters , including vapor pressures and octanol-water partition coefficients, which are directly related to PCDD/PCDF fate/pathway in the environment. The properties are, at present lacking or incomplete and are considered to be required properties in the environmental measurement.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 8,000 K	$ 8,000 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical report, publications in literature.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: Italy

TITLE OF PROJECT OR ACTIVITY: Contaminant Residues in Marine Organisms and Their Impact on the Food Chain.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Claudia Lintas
Istituto Nationale Della Nutritione
Via Ardeatina 546 - 00178 Rome (Italy)
PHONE (Italy-Rome) 5032412

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

National Research Council - Rome

IDENTIFYING NUMBER: _____ STARTING DATE: 1/01/88 COMPLETION DATE: 12/31/89

GOAL/RATIONALE/SCOPE: Assessment of Environmental Impact of Toxic Contaminants, Especially PAH's, PCDD's, PCDF's and similar compounds. Definition of detection techniques.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ 32 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Reports and Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics 2378 TCDD TCDD PCDD PCDF Other Compounds
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY:
Analysis of 2,3,7,8-Tetrachlorodibenzo-p-dioxin, 2,3,7,8-Tetrachlorodibenzofuran, polychlorinated biphenyls and polynuclear aromatic Hydrocarbons in Fish and Lobster Liver Tissue.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Keith Lockwood
NJ Dept. of Environmental Protection
Office of Science and Research (609) 984-6070
401 E. State St., CN-409
Trenton, NJ 08625

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)
National Oceanic and Atmospheric Administration
Northeast Fisheries Center
Sandy Hook, NJ

IDENTIFYING NUMBER: _____ **STARTING DATE:** / / **COMPLETION DATE:** / /

GOAL/RATIONALE/SCOPE: 1) To continue the NJDEP mandate to assess contamination in finfish and shellfish collected from ocean waters off New Jersey. 2) To determine geographic relationship between finfish body burdens and dredge spoil dumping.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 40 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
1) Scientific papers, journal articles
2) Technical reports
3) NJDEP policy papers

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: [bracket one] [A] B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Dioxin Bioavailability - Food Chain

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Keith B. Lodge
Natural Resources Research Institute
University of Minnesota - Duluth
Duluth, MN 55812

NAME, ADDRESS, AND TELEPHONE NUMBER OF SUPPORTING AGENCY (include name of Project Officer):

USEPA, Duluth Environmental Research Laboratory
6201 Congdon Boulevard
Duluth, MN 55804
Philip M. Cook (218-720-5523)

IDENTIFYING NUMBER: 5507 STARTING DATE: 10/01/84 COMPLETION DATE: 09/30/89

GOAL/RATIONALE/SCOPE: This project seeks to develop methods for predicting the bioavailability of chlorinated dioxins and related compounds to fish on the basis of isomer physical and chemical properties, route of exposure, water chemistry, organic particulate interactions, and pharmacokinetics of uptake and elimination.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 200 K	$ 350 K	$ 347 K	$ K	$ K

MAJOR OUTPUTS (e.g., technical reports, other publications, patents):

See attached list.

KEY WORDS [bracket appropriate key words on reverse side]:

KEY WORDS [BRACKET APPROPRIATE KEY WORDS]

Working Group	Select one only	Select one	Select all that apply	
A		[Environmental]	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	[Assessment]	Body Burden	Epidemiology	
		Risk	Transport/Mobility	[2378 TCDD]
		Effects	[Pharmacological]	TCDD
				[PCDD]
				[PCDF]
		Toxicity	[Bioaccumulation]	Other Compounds
	Properties	Synthesis	[Bioavailability]	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	[Animal]
		Incineration	Soil	Human
		Detoxification	[Sediment]	Environmental
	Destruction	Physicochemical	[Water]	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Receptor action and liver tumor promotion

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

George W. Lucier
Biochemical Risk Analysis
National Institute of Environmental Health Sciences
Research Triangle Park, NC 27709

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

In-house project

IDENTIFYING NUMBER: 1Z01 ES46004-01 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

To evaluate the quantitative relationships between dose of tumor promotor, receptor occupancy, critical changes in gene expression and histopathological alterations including preneoplastic lesions and tumor incidence in rats. Studied will be 2,3,7,8-TCDD, other PCDDs and PCDFs, and other compounds.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Presentations, publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)		Environmental	Monitoring	(Physiologic)
		Exposure	Pathways	Genetic
	(Assessment)	Body Burden	Epidemiology	
		Risk	Transport/Mobility	(2378 TCDD)
		(Effects)	(Pharmacological)	TCDD
				(PCDD)
				(PCDF)
	Properties	Toxicity	Bioaccumulation	(Other Compounds)
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	(Animal)
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	(Tissue)	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) xBxxxxx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Testing of Sample Techniques for Emission Measurements of PCDD and PCDF

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. K. Luetzke, Rheinisch-Westfälischer Technischer Überwachungsverein,
Steubenstr. 53, 4300 Essen, (0201) 82 533 17

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)
Umweltbundesamt, Bismarckplatz 1, 1000 Berlin 33, (030) 8903-409, (Dr. J. Abshagen)

IDENTIFYING NUMBER: 104 02 168 **STARTING DATE:** 1 / 6 / 87 **COMPLETION DATE:** 31 / 3 / 90

GOAL/RATIONALE/SCOPE:
Development of confirmed measurement techniques for the determination of dioxins in the pure gas of stationary plants

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 108 K	$ 177 K	$ 177 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	(Monitoring) Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC (Methods Research)
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	(Analytical Methods)	(Sampling)	
	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
STUDIES OF TOXIC DEPOSITION

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. M. Lusis (416-965-1634)
Ontario Ministry of Environment
Air Resources Branch
880 Bay St., 4th Floor
Toronto, Ontario, CANADA M5S 1Z8

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)
Dr. C. Tashiro (416-235-5897)
Dr. R.E. Clement (416-235-5896)
Ontario Ministry of Environment
P.O. Box 213, (125 Resources Road)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: _____ STARTING DATE: 01/ 04/ 86 COMPLETION DATE: / / unknown

GOAL/RATIONALE/SCOPE:

Study the presence of organic compounds in atmospheric precipitation, including CDDs/CDFs.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 5 K	$ 25 K	$ 15 K	$? K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report, Journal Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental ~~Exposure~~	Monitoring Pathways Epidemiology	Physiologic Genetic
	Assessment	Body Burden Risk Effects	Transport/Mobility Pharmacological	2378 TCDD ~~TCDD~~ ~~PCDB~~ ~~PCDF~~
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation	Other Compounds
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: Mechanism of immuno-suppression

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Michael I. Luster
PHS/DHHS/NIH/TRTP/STB
P.O. Box 12233, Mail Drop C1-04
Research Triangle Park, NC 27709
919-541-4188

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

In-house project

IDENTIFYING NUMBER: _____ STARTING DATE: / / 84 COMPLETION DATE: / / 89

GOAL/RATIONALE/SCOPE:
To examine the effects of TCDD on the immune system and blood-forming elements. In particular, the mechanism by which TCDD affects B lymphocyte and bone marrow stem cell differentiation. In vitro model systems are being used to determine both the cellular and biochemical events responsible for TCDD toxicity on immune cells.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 100 K	$ 100 K	$ 100 K	$ 100 K	$ 100 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	
	Analytical Methods			Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
Monoclonal antibodies for detection of dioxins

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. James Macmillan (201) 932-9522
Dr. Llonas Miller
Department of Biochemistry and Microbiology
Rutgers University-Cook College
New Brunswick, New Jersey 08903

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Dr. Gloria Post (609) 292-8497
NJ Department of Environmental Protection
Office of Science and Research
CN 409
Trenton, New Jersey 08625

IDENTIFYING NUMBER: C29523 STARTING DATE: 6/1/86 COMPLETION DATE: 7/31/87

GOAL/RATIONALE/SCOPE: 1) To produce monoclonal antibodies for use in developing simple but sensitive and highly specific immunological tests for determination of dioxins. 2) To develop, select and standardize test systems and evaluate their use in detection of dioxins in environmental samples.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 20,000 K	$ 19,000 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
Publication in appropriate journal. Ideally, detection method applicable to environmental samples.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD [illegible] PCDP PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation Equivalency	Other Compounds Standards
	Analytical Methods	Biological Sampling	Chemicokinetics	QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Waste Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Epidermal Growth Factor as a Modulation of Mediator of Dioxin Toxicity

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Fumio Matsumura
Michigan State University
East Lansing, Michigan 48824-1311
Telephone: (517) 353-2042

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Dr. K. Diane Courtney
Health Effects Research Laboratory (MD-67)
Research Triangle Park, North Carolina 27711
Telephone: (919) 541-2370

IDENTIFYING NUMBER: Task 72616D109 STARTING DATE: 5/1/87 COMPLETION DATE: 5/1/89

GOAL/RATIONALE/SCOPE: The purpose of this project is to determine the involvement of the epidermal growth factor in the various manifestations of dioxin toxicity of epidermal tissue or epidermally derived tissue. Additionally, it will be determined if the epidermal growth factor interacts with the plasma membrane receptor to promote the pleiotrophic toxicity of TCDD. A major toxic effect of TCDD involves the skin, the largest epidermal target organ. TCDD causes epidermal hyperplasia, chloracne, changes in the hair follicle, and keratinization of the skin. Normally these toxic endpoints are related to the presence of epidermal growth factor, however, TCDD may cause a decrease in the binding of the epidermal growth factor which results in the toxicity and, possible, terminal differentiation.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0.0 K	$ 0.0 K	$ 20.0 K	$ 20.0 K	$ 0.0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Report on the Epidermal Growth Factor as a Modulator of Plasma Membranes and the Influence of TCDD on the Epidermal Growth Factor and Its Effect on the Development of Epidermal and Epidermally Derived Tissues

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
Alteration of all-surface membrane for dioxin toxicity (rodents, rabbits)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Fumio Matsumura
Michigan State University
Pesticide Research Center
East Lansing, MI 48824-1311

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Public Health Service

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IDENTIFYING NUMBER: 5R01 ES03575-02 STARTING DATE: 2/1/86 COMPLETION DATE: 1/3/88

GOAL/RATIONALE/SCOPE:
To study biochemical changes caused by 2,3,7,8-TCDD and other related chloroaromatics in experimental animals. The major emphasis will be on the effect on plasma membrane-bound enzymes and receptors (hepatic plasma membrane functions, adipose tissue plasma membrane from guinea pigs), lipoprotein regulation in the guinea pig liver, extra-hepatic functions by reduced lipoprotein receptor interaction.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 126 K	$ 130K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical reports

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological) Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics (Physiologic) Genetic (2378 TCDD) TCDD PCDD PCDF (Other Compounds) Standards QA/QC Methods Research
	Properties	(Toxicity) Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air (Tissue) Food (Animal) Human Environmental Manufacturing Products Plant (Cell Cultures)
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: [bracket one] [A] B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Plant Uptake of Dioxin

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

In-house

NAME, ADDRESS, AND TELEPHONE NUMBER OF SUPPORTING AGENCY (include name of Project Officer):

USEPA, Corvallis Environmental Research Laboratory
200 SW. 35th Street
Corvallis, OR 97333
Craig McFarlane (503-757-4670)

IDENTIFYING NUMBER: 5527 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE: To determine uptake and translocation of dioxin in plants.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 30 K	$ 60 K	$ K	$ K	$ K

MAJOR OUTPUTS (e.g., technical reports, other publications, patents):

M. Champlin, Dioxin in Plants, Corvallis Environmental Laboratory Report, 1986.

KEY WORDS [bracket appropriate key words on reverse side]:

KEY WORDS [BRACKET APPROPRIATE KEY WORDS]

Working Group	Select one only	Select one	Select all that apply
[A]	[Assessment]	[Environmental] Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	[2378 TCDD] TCDD PCDD PCDF Other Compounds [Bioaccumulation] [Bioavailability] Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products [Plant] Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: [bracket one] [A] B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Potential for 2,3,7,8-TCDD Transport in Soils Using Both Static and Dynamic Systems

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

J.C. Means/Richard Walters
Department of Civil Engineering
University of Maryland
College Park, MD 20742
(301-454-3917)

NAME, ADDRESS, AND TELEPHONE NUMBER OF SUPPORTING AGENCY (include name of Project Officer):

USEPA, R.S. Kerr, Environmental Research Laboratory
P.O. Box 1198
Ada, OK 74820
M. Piwoni (405-332-8800)

IDENTIFYING NUMBER: _____ STARTING DATE: 05/15/84 COMPLETION DATE: 01/31/88

GOAL/RATIONALE/SCOPE: To provide necessary information to predict the rate of movement of 2,3,7,8-TCDD and homologs in soil and ground water in the presence or absence of co-disposed solvents. This will be accomplished using batch and column studies using solvents or solvent/water mixtures as the liquid phase and Missouri soils as the sorbent. A second phase of this research is using low-carbon aquifer material as the sorbent and actual wastes such as from wood preserving activities (containing pentachlorophenol).

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 210 K	$ 150 K	$ 157 K	$ --- K	$ --- K

MAJOR OUTPUTS (e.g., technical reports, other publications, patents):

See attached sheet

KEY WORDS [bracket appropriate key words on reverse side]:

KEY WORDS [BRACKET APPROPRIATE KEY WORDS]

Working Group	Select one only	Select one	Select all that apply	
[A]		[Environmental]	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	[Assessment]	Body Burden	Epidemiology	
		Risk	[Transport/Mobility]	[2378 TCDD]
		Effects	Pharmacological	[TCDD]
				PCDD
				PCDF
		Toxicity	Bioaccumulation	Other Compounds
	Properties	Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	[Chemicokinetics]	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	[Soil]	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Toxicity and Bioconcentration of 2,3,7,8-TCDD and 2,3,7,8-TCDF in Raibow Trout

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Paul Mehrle
National Fisheries Contaminant Research Chenter
U.S.D.I., Fish and Wildlife Service, Rt. 1
Columbia, Missouri 65201 314-875-5399

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Same as above.

IDENTIFYING NUMBER: 883.04 STARTING DATE: 10/1/85 COMPLETION DATE: 10/1/87

GOAL/RATIONALE/SCOPE: The goal of this research was to determine the toxicity and bioconcentration of 2,3,7,8-TCDD and 2,3,7,8-TCDF in early life stages of Rainbow Trout. The investigations focused on a 30 day exposure in water at extremely low water concentrations (parts per quadrillion, Pg/l) ranges.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 100 K	$ 86 K	$ 25 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

A scientific manuscript describing results of studies will be submitted to Environmental Toxicology and Chemistry in March 1987. In addition, presentations were made at the annual SETAC meeting in November 1986 and at the annual ASTM meeting in May 1986.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	(Assessment)	Environmental (Exposure) Body Burden Risk Effects	Monitoring Pathways Epidemiology (Transport/Mobility) Pharmacological (Physiologic) Genetic (2378 TCDD) TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	(Bioaccumulation) Bioavailability Biotransformation Equivalency (Chemicokinetics) Standards QA/QC Methods Research
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
Fate of toxic chemicals in hepatocyte and hepatoma cells (rats, human)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Michael J. Meredith
Vanderbilt University
CTR/Environmental Toxicology
Nashville, TN 37232

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 ES03272-03 STARTING DATE: 6/1/84 COMPLETION DATE: 5/30/87

GOAL/RATIONALE/SCOPE:

The effect of glutathione (GSH) depletion caused by 2,3,7,8-TCDD and other GSH depleting agents, or the thiol status of selected cell types. The cells to be examined include cultures of rat and human hepatocytes, hepatocarcinoma HR-35 cells, non-tumorigenic epithelial adult rat liver ARL-15C1 and the tumorigenic line ARL-16T2.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 99 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological) Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics (Physiologic) Genetic (2378 TCDD) TCDD PCDD PCDF (Other Compounds) Standards QA/QC Methods Research
	Properties	(Toxicity) Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food (Animal) (Human) Environmental Manufacturing Products Plant (Cell Cultures)
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** U.S.A.

TITLE OF PROJECT OR ACTIVITY: TCDD Vapor-Phase Photolysis

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. Theodore Mill 415-326-6200
SRI International
333 Ravenswood Ave.
Menlo, CA 94025

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
U.S. Environmental Protection Agency
401 M St., S.W.
Washington, D.C. 20460
Contact: Seong T. Hwang 202-475-8919

IDENTIFYING NUMBER: _____ **STARTING DATE:** 01/01/86 **COMPLETION DATE:** 11/01/87

GOAL/RATIONALE/SCOPE: The objective of this project is to determine the extent to which vapor-phase photolysis of 2,3,7,8-TCDD is important in the atmospheric degradation of the compound. The assumptions that currently must be made for this parameter significantly increase the uncertainty in exposure assessments involving TCDD contaminated soil. Gas-phase photolysis rates of 2,3,7,8-TCDD will be determined in the laboratory and extrapolated to field conditions. The work may be extended to particulate-sorbed TCDD.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 102.0 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
Draft Summary Report: Photolysis of TCDD and PCBs in the Atmosphere (April 15, 1987)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Studies on electrophilic ultimate carcinogens (mice, rats)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

James A. Miller
University of Wisconsin
450 N. Randall Avenue
Madison, WI 53706

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5P01CA22484-09 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

No abstract available.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 174 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological)	(Physiologic) Genetic 2378 TCDD (TCDD) PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability (Biotransformation) Equivalency Chemicokinetics	Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air (Tissue)	Food (Animal) Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: [bracket one] [A] B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Dioxin Photolysis: Soil Surfaces

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Glenn Miller
Department of Biochemistry
University of Nevada
Reno, NV 89557
(702-784-4108)

NAME, ADDRESS, AND TELEPHONE NUMBER OF SUPPORTING AGENCY (include name of Project Officer):

USEPA, Athens Environmental Research Laboratory
College Station Road
Athens, GA 30613
Richard Zepp (404-546-3428)

IDENTIFYING NUMBER: _____ STARTING DATE: 05/ /86 COMPLETION DATE: 05/ /88

GOAL/RATIONALE/SCOPE: To conduct kinetic and product studies of dioxin transport and transformation in the upper layer of soils. Photolysis is suspected to be a major transformation route for dioxins in soils associated with hazardous wastes.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0 K	$ 100 K	$ K	$ K	$ K

MAJOR OUTPUTS (e.g., technical reports, other publications, patents):

KEY WORDS [bracket appropriate key words on reverse side]:

KEY WORDS [BRACKET APPROPRIATE KEY WORDS]

Working Group	Select one only	Select one	Select all that apply
[A]	[Assessment]	[Environmental] Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology [Transport/Mobility] Pharmacological Physiologic Genetic 2378 TCDD [TCDD] PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency [Chemicokinetics]
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge [Soil] Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: United States of America

TITLE OF PROJECT OR ACTIVITY: Preparation of Standards and Investigation of Physical Properties and Environmental Contamination by Brominated and Bromochlorinated Dioxins and Dibenzofurans

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Ronald K. Mitchum, United States Environmental Protection Agency, Environmental Monitoring Systems Laboratory, P.O. Box 15027, Las Vegas, Nevada 89114
(702) 798-2101

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)
United States Environmental Protection Agency, Environmental Monitoring Systems Laboratory, P.O. Box 15027, Las Vegas, Nevada 89114. Agency: (702) 798-2100
Project Officer: Anders Denson, (702) 798-2577; Task Monitor: G. Wayne Sovocool, (702) 798-2212.

IDENTIFYING NUMBER: 68-03-3249; 70.18 STARTING DATE: 12/19/86 COMPLETION DATE: 9/30/89

GOAL/RATIONALE/SCOPE: The objective is the synthesis, characterization and evaluation of environmental contamination of brominated and bromochlorinated dibenzodioxins and dibenzofurans. Correlation of the chromatographic properties of the brominated compounds with chlorinated retention indices have been developed as an aid to characterization of synthetic mixtures resulting from electrophilic bromination. RCRA Method 8280 analytical methodology has been tested and extended to brominated analogs of dioxins and dibenzofurans. Fly ash has been investigated as a source of environmental contamination.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 100 K	$ 200 K	$ 150 K	$ 125 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Synthesis of Brominated Dioxins and Furans: Chemosphere 16, 221 (1987); Chemosphere 16 (1987) (in press). Retention indices: J. Chromatogr. 392, 51 (1987); Analytical Methodology: Biomedical and Environmental Mass Spectrometry (in press); Reference Materials for Analysis of Halogenated Dioxins and Furans: Progress Report (EPA/600/X-86/255). Expected: Synthesis, retention indices and analytical methodology for bromochlorodioxins and dibenzofurans. Analysis of environmental samples, as fly ash, through use of RCRA Method 8280.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA FF22

TITLE OF PROJECT OR ACTIVITY:

Bioavailability of Dioxins

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Derek C.G. Muir (204) 983-5168
Freshwater Institute, Department of Fisheries and Oceans
501 University Crescent, Winnipeg, MB Canada R3T 2N6

+ Mark Servos, A.L. Yarechewski, B.E. Townsend

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Department of Fisheries and Oceans

IDENTIFYING NUMBER: _____ STARTING DATE: 82/05/01 COMPLETION DATE: continuing

GOAL/RATIONALE/SCOPE:

To investigate the environmental chemistry of chlorinated dioxins to understand their fate and distribution, accumulation and elimination in fish, and bioavailability in food to fish.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 10,000 K	$ 10,000 K	$ 8,000 K	$ [illegible] K	$ [illegible] K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

D.C.G. Muir, B.E. Townsend, and G.R.B. Webster. 1985. Bioavailability of ^{14}C-1,3,6,8-Tetrachlorodibenzodioxin and ^{14}C-Octachlorodibenzodioxin to Aquatic Insects in Sediment and Water in L.H. Keith, G. Choudhary, and C. Rappe, eds. "Chlorinated Dioxins in the Total Environment - II", American Chemical Society, Washington, DC, USA, pp.89-102.

D.C.G. Muir, A.L. Yarechewski, and G.R.B. Webster. 1985. Bioconcentration of Four Chlorinated Dioxins by Rainbow Trout and Fathead Minnows in R.C. Bahner and D.J. Hansen, eds. "ASTM Aquatic Toxicology and Hazard Assessment: 8th Symposium, Philadelphia, PA, USA, ASM STP 891", pp.440-454.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:		
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological		Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation		
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology		1,2,6,8-T_4CDD 1,2,3,7-T_4CDD 1,2,3,8-T_4CDD 1,2,3,4,7-P_5CDD 1,2,3,4,7,8-H_6CDD 1,2,3,4,6,7,8-H_7CDD O_8CDD
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures	
	Waste Management	Interim Storage Exposure Control			
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring		

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: Health Assessment of PCDFs

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. Debdas Mukerjee 513-569-7572
26 W. St. Clair Street
Cincinnati, Ohio 45268

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
U.S. Environmental Protection Agency
401 M Street, SW
Washington, D.C. 20460
Contact: Dr. Debdas Mukerjee 513-569-7572

IDENTIFYING NUMBER: _____ STARTING DATE: 01/01/84 COMPLETION DATE: 12/01/87

GOAL/RATIONALE/SCOPE: Review and summarize literature relating to the health effects of PCDFs. Using data found in the literature conduct a dose-response assessment of PCDFs.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Health Assessment Document for PCDFs, Review Draft. June 1986.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)		Environmental	Monitoring	Physiologic
	(Assessment)	Exposure	(Pathways)	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		(Effects)	Pharmacological	TCDD
				PCDD
				(PCDF)
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) xB xCx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Immunotoxicologic Studies at Pollutant-Loaded Persons for Effects of Halogenated Dioxins and Related Compounds-Immunobiological Survey

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Prof. Dr. W. Müller-Ruchholtz, Abteilung Immunobiologie der Universität Kiel, Olshausenstraße 40 - 60, 2300 Kiel, (0431)597-3340

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Gesellschaft für Strahlen- und Umweltforschung mbH München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089)3187-3372 (Dr. Ende)

IDENTIFYING NUMBER: 07 64 003A **STARTING DATE:** 01/11/87 **COMPLETION DATE:** 31/10/88

GOAL/RATIONALE/SCOPE: Immunotoxicologic Studies at humans - is there a relationship between PCDD/PCDF exposure and changed immunobiological parameters?

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1988	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ 51 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

reports, publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: U.S. Environmental Protection Agency National Dioxin Study

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR: McBride

Robert Harless, US EPA, MD-77, RTP, NC 27711 919-541-2248
Aubry Dupuy, US EPA, NASA/NSTL, Bldg 1105, Bay, St. Louis, MO 39529 601-688-3212
Donny McDaniel, " " " " " " 601-688-3253
Doug Kuehl, US EPA, Duluth, MN 55804 218-720-5550

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

U.S. Environmental Protection Agency, Norbert Jaworski 401-782-3001

IDENTIFYING NUMBER: -- STARTING DATE: 11/1/83 COMPLETION DATE: 3/30/86

GOAL/RATIONALE/SCOPE: 1. Determine the absence or degree of environmental contamination by ppt levels of 2378-TCDD in soil, sediment, fish and ppq levels in water. 2. Determine the absence or presence ofpg or ng amounts of 2378-TCDD, 2378-TCDF and other penta, through octa CDDs and CDFs in emissions to the environment from specific types of combustion and incineration processes.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 150 K	$ 0 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Standards QA/QC Methods Research
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) ~~B~~ ~~C~~ **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Studies on Pharmacokinetics and Toxicology of a PCDD/PCDF Mixture as well as some Relevant Poly-brominated Compounds at Rodents and Primates

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Dr. Diether Neubert/Dr. R. Krowke, Institut für Toxikologie und Embryonalpharmakologie der Freien Universität Berlin, Garystr. 7, 1000 Berlin 33, (030)838-3195

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Gesellschaft für Strahlen- und Umweltforschung mbH München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089)3187-3372 (Dr. Ende)

IDENTIFYING NUMBER: 07 VDX 01 **STARTING DATE:** 01/02/87 **COMPLETION DATE:** 31/01/91

GOAL/RATIONALE/SCOPE: Effect analysis of a mixture of PCDD/PCDF that corresponds in its composition to the PCDD/PCDF mixture from combustion processes.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 268 K	$ 268 K	$ 268 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

reports, publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods	Sampling		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) ((A)) (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Polychlorinated Dibenzodioxines/Dibenzofurans in the Environment, in Food and Human Samples - Sampling, Analysis, Assessment -

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Dr. G. v. Nieding, Dr. W. Rotard (Environment), call: 030/8308-2344, Dr. Beck (Food and Human Samples) call: 030/8308-2595
Institut für Wasser-, Boden- und Lufthygiene des Bundesgesundheitsamtes, Corrensplatz 1, D-1000 Berlin 33

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Gesellschaft für Strahlen- und Umweltforschung mbH, c/o Dr. Bauer, Bereich Projektträgerschaften
Josephspitalstr. 15, D-8000 München 2, call: 089/598661

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IDENTIFYING NUMBER: 0765001 4 **STARTING DATE:** 1/7/85 **COMPLETION DATE:** 31/12/88

GOAL/RATIONALE/SCOPE:
Investigation of different Environmental samples (oil, soil, indoor dust/air, wood protection formulations, emissions, immissions), food and human samples for polychlorinated dibenzodioxins and dibenzofurans. Identification of sources of the human contamination. Risk and exposure assessment as from obtained results.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 330.000 K	$ 320.000 K	$ 310.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Chemosphere, 1986 in press

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods	Sampling		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA FE18

TITLE OF PROJECT OR ACTIVITY: Level and Dynamics of Chlorinated Dioxins, Furans and Related Compounds in Wildlife.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

R.J. Norstrom
Environment Canada
Canadian Wildlife Service
National Wildlife Research Centre
Ottawa, Ontario K1A 0E7

Telephone: (819) 997-1411

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

ENVIRONMENT CANADA, OTTAWA, CANADA K1A 0E7

IDENTIFYING NUMBER: N/A STARTING DATE: 1/4/81 COMPLETION DATE: 31/3/94

GOAL/RATIONALE/SCOPE:

Goals: To determine the exposure of Canadian Wildlife to CDDs, CDFs and related compounds, especially in aquatic habitats, and assess the risks involved with this exposure; to use levels of CDDs and CDFs in wildlife as indicators of sources and geographical/temporal trends.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 75,000 K	$ 75,000 K	$ 75,000 K	$ 75,000 K	$ 75,000 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications on analytical method, trends in Great Lakes.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation Equivalency	
	Analytical Methods	Biological Sampling	Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY: "STRUCTURE AND FUNCTION OF THE Ah RECEPTOR"

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Allan B. Okey
Division of Clinical Pharmacology (416) 598-5781
The Hospital for Sick Children
555 University Avenue
Toronto, Ontario CANADA M5G 1X8

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Medical Research Council of Canada
Ottawa, Ontario Canada K1A 0W9

IDENTIFYING NUMBER: MT 7324 STARTING DATE: 1980 / / COMPLETION DATE: 1990 / /

GOAL/RATIONALE/SCOPE:

The goal is to characterize the structure and function of the Ah receptor, a soluble intracellular protein which appears to mediate the toxic actions of 2,3,7,8-tetrachlorodibenzo-p-dioxin and related halogenated aromatic compounds.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 45,000 K	$ 45,000 K	$ 45,000 K	$ 45,000 K	$ 45,000 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

CHEMOSPHERE 14:661-674 (1985)
J. BIOL. CHEM. 261:3987-3995 (1986)
EUR. J. BIOCHEM. 155:223-229 (1986)
J. BIOL. CHEM. 261:10189-10195 (1986)
CANCER RESEARCH 46:3739-3743 (1986)
CHEMOSPHERE 15:1665-1672 (1986)
BIOCHEMICAL TOXICOLOGY 1:39-49 (1986)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Mechanism(s) for toxicity of chlorinated dibenzodioxins (rodents, human)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

James R. Olson
SUNY at Buffalo
127 Farber Hall
Buffalo, NY 14214

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 ES02693-05 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE: To explain the interspecies variability in pathology and LD50 following exposure to TCDD by studying the significance of TCDD metabolism and the role of the central and peripheral nervous system in the expression of the acute toxicity of TCDD. The in-vitro metabolites of TCDD on isolated hepatocyte incubations of different species will be determined, as well as TCDD metabolites in urine and bile. The effect to TCDD exposure on the morphology of the central and peripheral nervous system, permeability of the blood-brain barrier and conduction velocity of peripheral nerves will be assessed.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 65 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	(Physiologic) Genetic (2378 TCDD) TCDD PCDD PCDF
	(Properties)	(Toxicity) Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC
	Analytical Methods	Sampling		Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food (Animal) (Human) Environmental Manufacturing Products Plant (Cell Cultures)
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Synthesis of Chlorinated Dibenzo-p-dioxins and Related Compounds

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Donald G. Patterson, Jr., Ph.D. (404) 452-4176
Bldg. 17, Rm. 1814
Centers for Disease Control
Atlanta, GA 30333

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Michael J. Rich
Assistant Director, EHLS
Bldg. 17
Centers for Disease Contrl
Atlanta, GA 30333

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE: Synthesize all 2,3,7,8-containing chlorinated dibenzo-p-dioxins and dibenzofurans; the first and last elutes (on DB-5) of each series; and any that interfere with the 2,3,7,8-PCDDs and PCDFs (on DB-5 and SP-2330). Also, synthesis of selected biphenylenes, PCBs, pyrenes and other related compounds. The structure of these compounds will be verified by NMR, GC/FTIR, GC/FID, GC/ECD, GC/MS and DSC.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

See Attached

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Polychlorinated dibanzo-p-dioxins and dibenzofurans: Persistence and toxicity in freshwater fish

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Richard E. Peterson
School of Pharmacy
University of Wisconsin
Madison, WI 53706

608-263-5453 (office)
608-262-4751 (lab)

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Sea Grant
1800 University Avenue
University of Wisconsin
Madison, WI 53706

608-262-0905

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:
To study persistence, tissue distribution and biotransformation of 2,3,7,8-tetrachlorodibenzo-p-dioxin (TCDD) in rainbow trout, yellow perch and other freshwater fish species. To study toxicity and histopathology of TCDD in fish.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 60 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Environmental pollutants and toxicology of the liver (rats, monkeys)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Richard E. Peterson
School of Pharmacy (608)263-5453
University of Wisconsin (608)262-4751
425 N. Charter Street
Madison, WI 53706

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 2R01 ES01332-12 STARTING DATE: 7 / / 75 COMPLETION DATE: 7 / 31 / 91

GOAL/RATIONALE/SCOPE:
To study the effect of 2,3,7,8-TCDD on the male reproductive system and gastrointestinal (GI) mucosa. The results should provide new insights concerning the effects of TCDD on steroidogenic organs and on pituitary and hypothalamic function, and on the carcinogenic action of halogenated aromatic hydrocarbons on the GI mucosa.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 90 K	$ 96 K	$ 104 K	$ 110 K	$ 114 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY: Investigation of the Combustion Products from High Impact Polystyrene Containing Decabromodiphenyl Ether as a Flame Retardant

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Michael N. Pinkerton
Ethyl Corporation
P.O. Box 14799
Baton Rouge, LA 70820

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Brominated Flame Retardant Industry Panel

IDENTIFYING NUMBER: _____ **STARTING DATE:** 3/1/86 **COMPLETION DATE:** 9/1/88

GOAL/RATIONALE/SCOPE:

The research program involves laboratory studies wherein composite samples of plastics with and without brominated flame retardants are burned under conditions designed to approximate those of real fires. Samples of soot and char resulting from these burns are collected for toxicity and analytical studies. Conventional toxicologic studies in laboratory animals are used to evaluate the comparative acute toxicity and acnegenic potential of the soot and char.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 8 K	$ 80 K	$ unknown K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation	Other Compounds
	Analytical Methods	Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Toxicant deregulation of endocrine heme biosynthesis (rats, hamsters, guinea pigs)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Walter N. Piper
University of Nebraska Medical Center
42nd and Dewey Avenue
Omaha, NE 68105

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 ES02423-05 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

To separate testicular cell types (e.g., Leydig cells) and to study the differential regulation of heme synthesis by TCDD; to study the inhibition of testicular heme synthesis by TCDD and its reversal by corticosterone, and to study the regulation of steroidogenesis in the adrenal gland by TCDD.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 68 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological) (Physiologic) Genetic (2378 TCDD) TCDD PCDD PCDF (Other Compounds) Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food (Animal) Human Environmental Manufacturing Products Plant (Cell Cultures)
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Determination of Half-Life of 2,3,7,8-TCDD in Humans

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

James L. Pirkle, M.D.,Ph.D. (404) 452-4152
Assistant Director for Science, EHLS
Bldg. 17
Centers for Disease Control
Atlanta, GA 30333

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Division of Environ. Hlth. and Laboratory Sciences
Center for Environmental Health
Centers for Disease Control
Atlanta, GA 30333

IDENTIFYING NUMBER: _____ STARTING DATE: 4 / / 87 COMPLETION DATE: 5 / / 87

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GOAL/RATIONALE/SCOPE: Serum samples collected in 1982 and 1987 from 75 selected U.S. Air Force "Ranch Hand" personnel will be analyzed for 2,3,7,8-TCDD. Each of these serum dioxin measurements will be adjusted for total lipids in the serum. Estimates of the half-life of 2,3,7,8-TCDD in each veteran will be made.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 200 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report and publication will be forthcoming. Also information will be used in other studies to estimate extent of original exposure.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation	
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY: Studies on the halogenated aromatic hydrocarbons (mice, hamsters, rats)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Alan P. Poland 608-263-4959
University of Wisconsin
450 N. Randall Avenue
Madison, WI 53706

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service - NIEHS

IDENTIFYING NUMBER: 2R01 ES01884-10 **STARTING DATE:** 2/1/86 **COMPLETION DATE:** 1/31/91

GOAL/RATIONALE/SCOPE: The characteristic toxic responses of TCDD appear to be mediated through the stereospecific binding of TCDD to a cytosol receptor, the product of the Ah locus. It is planned to study the properties of this receptor, the pleiotropic responses it mediates, and how this is related to the toxicity of TCDD.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 250K	$ 150 K	$ 150 K	$ 150 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk Effects	(Monitoring) Pathways Epidemiology Transport/Mobility (Pharmacological) (Physiologic) (Genetic) (2378 TCDD) (TCDD) (PCDD) (PCDF) (Other Compounds)
	Properties	(Toxicity) Synthesis Physicochemical Reactivity/Stability Biological Sampling	(Bioaccumulation) (Bioavailability) (Biotransformation) (Equivalency) (Chemicokinetics)
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food (Animal) (Human) (Environmental) Manufacturing Products Plant
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Causal Structure-Activity Methods Applied to the Assessment of the Toxicity of Dibenzo-p-Dioxins and Dibenzofurans that are Useful in Predicting Their Biological Activity

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Peter Politzer
Department of Chemistry
University of New Orleans
New Orleans, Louisiana 70122
Telephone: (504) 286-6850

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Dr. James R. Rabinowitz
Health Effects Research Laboratory (MD-68)
Research Triangle Park, North Carolina 27711
Telephone: (919) 541-5714

IDENTIFYING NUMBER: Task 72425D109 STARTING DATE: 10 / 1 / 85 COMPLETION DATE: 9 / 30 / 88

GOAL/RATIONALE/SCOPE: The goal is to develop and test computational structure-activity relationship (SAR) methods (based on molecular properties related to the mechanisms of interaction with biologocal systems) for assessing the toxicity of dioxin-like chemicals. The numbers of these chemicals makes comprehensive testing impossible. Reliable computational procedures will aid in assessment and in setting testing priorities. The molecular electrostatis potential and other key features of recognition processes for various dioxin-like chemicals will be computed and analyzed.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0.0 K	$ 60.0 K	$ 60.0 K	$ 0.0 K	$ 0.0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Journal articles on, "The Effects of Electrostatis Potential on the Activity of Dioxin-Like Chemicals."

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics 2378 TCDD TCDD PCDD PCDF Other Compounds
	Analytical Methods	Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: PCDD in influent, effluent and sludge of POWT-plants

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

DBW/RIZA; ir. H.B. Pols, P.O. Box 17, 8200 AA LELYSTAD, The Netherlands
tel. (3200) 70449

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

IDENTIFYING NUMBER: DB-132 **STARTING DATE:** 01/04/86 **COMPLETION DATE:** 01/04/87

GOAL/RATIONALE/SCOPE: Monitoring of PCDD and PCDF in POWT-plants

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 20 K	$ 15 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Italy

TITLE OF PROJECT OR ACTIVITY: PCBS Toxic Effects in Pregnant and Virgin Rabbits and Transfer via milk to Suckling Offspring.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Pompa, Giuseppe, Montesissa Clara, di Lauro Federico, Fadini Luigi.
Institute of Veterinary Pharmacology and Toxicology - FAC. of Veter. Medicine.
Via Celoria 10 - 20133 Milano

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

FINANCIAL SUPPORT BY M.P.I. ROMA-ITALY project M.P.I. 40% (1982/86) project officer:
Prof. P. Preziosi.

IDENTIFYING NUMBER: _____ **STARTING DATE:** 10 / / 82 **COMPLETION DATE:** 11 / / 87

GOAL/RATIONALE/SCOPE: Evaluation of toxic effects of administered PCBs to virgin and pregnant rabbits such as induction on some hepatic MFO enzymes in dams and in suckling offspring receiving PCBs with milk.
Quali-quantitative assessment of PCB isomers in animal tissues by improved capillary G.L.C. analytical methods.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 20 K	$ 20 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

POMPA G. MONTESISSA C., DI LAURO F., FADINI L.: Trattamento di coniglie gravide con Fenclor 64. riscontri di induzione enzimatica nei fegati dei feti e dei neonati naturalmente allattati.
Atti XXXIX S.I.S.VET. 1985

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation	Other Compounds PCB
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Mechanisms of toxicity of dioxin (mice)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

S. Madli Puhvel
University of California
Los Angeles, CA 90024

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 ES03597-02 STARTING DATE: 2 / 1 / 86 COMPLETION DATE: 1 / 31 / 88

GOAL/RATIONALE/SCOPE:

To compare the changes in cutaneous morphology and biochemical reactions in skin of congenic HRS/J mice in vivo and in vitro in response to dioxin exposure.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 118K	$ 130 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological) Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics (Physiologic) Genetic (2378 TCDD) TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	(Toxicity) Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air (Tissue) Food (Animal) Human Environmental Manufacturing Products Plant (Cell Cultures)
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
Keratinocyte envelopes--Physiology and toxic mechanisms (rats, rabbits, human)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Robert H. Rice
Harvard School of Public Health
665 Huntington Avenue
Boston, MA 02115

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 AR27130-07 STARTING DATE: 3/1/86 COMPLETION DATE: 11/30/87

GOAL/RATIONALE/SCOPE:
To investigate aspects of cross-linked envelope formation in human and rat keratinocytes serially cultivated with 3T3 feeder layer support: (1) biochemical basis of envelope formation, (2) effect of culture conditions on envelope formation, (3) cellular responses to 2,3,7,8-TCDD and other model toxic agents in keratinocytes which exhibit intrinsic differences in regulation of envelope formation.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 130 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological) (Physiologic) Genetic (2378 TCDD) TCDD PCDD PCDF (Other Compounds)
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air (Tissue) Food (Animal) (Human) Environmental Manufacturing Products Plant (Cell Cultures)
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
Arachidonate products in dioxin and PCB toxicity (chick embryos)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Arleen B. Rifkind
1300 York Avenue
New York, NY 10021

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 ES03606-02 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

To examine abnormalities in arachidonic acid metabolism that may be caused by dioxin and other polyhalogenated aromatic hydrocarbons (PAH), and the role of arachidonic acid metabolites in PAH toxicity.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 200 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological (Physiologic) Genetic 2378 TCDD (TCDD) PCDD PCDF (Other Compounds)
	Properties	Toxicity Synthesis Physicochemical	Bioaccumulation Bioavailability Biotransformation
	Analytical Methods	Reactivity/Stability Biological Sampling	Equivalency Chemicokinetics Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air (Tissue) Food (Animal) Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: Vapor Pressure and Partitioning Behavior of 2,3,7,8-substituted Dioxins and Furans

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. Robert Riley 509-376-1935
Battelle Pacific N.W. Laboratory
P.O. Box 999
Richland, WA 99352

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
U.S. Environmental Protection Agency
401 M St., S.W. (RD-689)
Washington, D.C. 20460
Contact: Gregory Kew 202-475-8924

IDENTIFYING NUMBER: DW 89931377-01 STARTING DATE: 01/01/86 COMPLETION DATE: 12/01/87

GOAL/RATIONALE/SCOPE: The objective of this project is to supply experimental information on the fundamental physical properties of a limited number of 2,3,7,8-chlorine-substituted congeners of tetra-, penta-, and hexa-CDDs and CDFs. These fundamental properties are of primary concern for use in environmental transport and fate estimates used in exposure assessments. The critical properties evaluated will include vapor pressure, water solubility, and partition coefficients.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 40.0 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD (PCDD) PCDF Other Compounds Standards QA/QC Methods Research
	(Properties)	Toxicity Synthesis (Physicochemical) Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: Risk Assessment Approach for 2,3,7,8-TCDD

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR: Mr. Charles Ris 202-382-7311
401 M St., S.W. (RD-689)
Washington, D.C. 20460

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)
U.S. Environmental Protection Agency
401 M St., S.W.
Washington, D.C. 20460
Contact: Dr. Charles Ris 202-382-7311

IDENTIFYING NUMBER: _____ STARTING DATE: 01/01/85 COMPLETION DATE: 12/01/85

GOAL/RATIONALE/SCOPE: The objective of this project has been to assemble and discuss in one document the risk assessment methods for 2,3,7,8-TCDD used by EPA, and to contrast and compare EPA's methods to approaches which have been adopted by CDC and FDA. Estimates of risk derived by these three principal agencies have differed by two to three orders of magnitudes - the variables responsible being preferences in procedures used to extrapolate from high to low doses, the use of body surface area or weight, and assumptions concerning amounts of fish or soil consumed. The scope has been broadened to include other agencies, states, countries.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 64.0 K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
U.S. EPA. 1985. Health Risk Assessment Approach for 2,3,7,8-Tetrachlorodibenzo-p-dioxin. EPA-600/8-85-013.

U.S. EPA. 1985. Comparison of Dioxin Hazard Assessments - EPA and Others. 12/85.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:

Umweltgefährdungspotentiale von Chemikalien (Environmental Hazard Potentials of Chemicals)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. H. Rohleder, Gesellschaft für Strahlen- und Umweltforschung mbH
Projekt Umweltgefährdungspotentiale von Chemikalien (PUC), D-8042 Neuherberg

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

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IDENTIFYING NUMBER: 75312 **STARTING DATE:** 1/3/83 **COMPLETION DATE:** Summer 86

GOAL/RATIONALE/SCOPE:

Environmental Modelling for the Comparison of Env. Hazard Potentials of Existing (Marketed) Chemicals, i.e. so called "Priority Setting"

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 200.000 K	$ _ K	$ _ K	$ _ K	$ _ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Software, Reports in Preparation
(available Summer 1986)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Mechanisms of species differences in TCDD toxicity

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. Karl Rozman, Dept. Pharmacol, University of Kansas, Kansas City, Kansas
Prof. Dr. med. H. Greim, Dept. Toxicology,
Gesellschaft für Strahlen- und Umweltforschung, D-8042 Neuherberg, Tel.: 089/3187-2446

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Bayerisches Staatsministerium für Landesentwicklung und Umweltfragen,
Rosenkavalierplatz 1, D-8000 München 81

IDENTIFYING NUMBER: _____ **STARTING DATE:** / / **COMPLETION DATE:** / /

GOAL/RATIONALE/SCOPE:

Identification of the mechanisms which contribute to the large species differences in TCDD toxicity in relation to human sensitivity

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1.000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 40.000 K	$ 70.000 K	$ 25.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
K. Rozman, T. Rozman, H. Greim: EFFECT OF THYROIDECTOMY AND THYROXINE ON 2,3,7,8-TETRACHORODIBENZO-p-DIOXIN (TCDD) INDUCED TOXICITY, Toxicol Appl. Pharmacol 72, 372-376, 1984
K. Rozman: SEPARATION OF WASTING SYNDROME AND LETHALITY CAUSED BY 2,3,7,8,-TETRACHLORODIBENZO-p-DIOXIN. ToxLett 22, 279-285 (1984)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Mechanism(s) of TCDD toxicity (rats)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Diane H. Russell
University of Arizona
Department of Pharmacology
Tucson, AZ 85724

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 ES03587-02 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

To study the ability of TCDD to alter the circulating levels of major developmental and differentiative hormones. Monitored will be the serum prolactin levels, circulating glucocorticoid levels, and catecholamine levels, and their effects on modification of ornithine decarboxylase activity and RNA polymerase I activity in the liver of TCDD-treated rats will be assessed.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 112 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological)
	Properties	(Toxicity) Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

(Physiologic)
Genetic

(2378 TCDD)
TCDD
PCDD
PCDF
Other Compounds

Standards
QA/QC
Methods Research

Food
(Animal)
Human
Environmental
Manufacturing Products
Plant
Cell Cultures

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: Canada

TITLE OF PROJECT OR ACTIVITY: PCDDs and PCDFs: Method development survey of foods and biological samples to estimate exposure and sources.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. John J. Ryan
613-957-0978
Foods Directorate
Health Protection Branch
Health and Welfare Canada
Ottawa, Canada K1A 0L2

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

IDENTIFYING NUMBER: _____ STARTING DATE: - /1/78 COMPLETION DATE: - /1/91

GOAL/RATIONALE/SCOPE: Application of reliable chemical methodology for the determination of PCDDs and PCDFs to ascertain levels in food and human tissue samples. Use data in order to estimate exposure and specify sources.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 150 K	$ 150 K	$ 175 K	$ 200 K	$ 200 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

1. Chemosphere 15 (1986) 537
2. Chemosphere 15 (1986) 1586
3. Chlorinated dioxins and dibenzofurans in perspective, Chp. 1, pp. 3-16 (1986)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Polychlorinated dibenzo-p-dioxins (PCDDs) and dibenzofurans (PCDFs)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Stephen H. Safe 409-845-5988
Vet. Physiol. & Pharmacol.
Texas A&M University
College Station, TX 77843

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

U.S. EPA

IDENTIFYING NUMBER: CR 811628 STARTING DATE: 10/1/85 COMPLETION DATE: 9/30/88

GOAL/RATIONALE/SCOPE:

Development and validation of bioassays for quantitative determination of 2,3,7,8-TCDD equivalence for compounds and mixtures.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 75 K	$ 75 K	$ 75 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Assay of AH Receptor Using Monoclonal Antibodies

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Steven H. Safe
Department of Veterinary Physchology and Pharmacology
Texas A&M University
College Station, Texas 77843
Telephone: (409) 845-7261

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Dr. K. Diane Courtney
Health Effects Research Laboratory (MD-67)
Research Triangle Park, North Carolina 27711
Telephone: (919) 541-2370

IDENTIFYING NUMBER: Task 72615D109 STARTING DATE: 5/1/87 COMPLETION DATE: 5/31/89

GOAL/RATIONALE/SCOPE: The purpose of this project is to produce monoclonal antibodies to the gene-mediated arylhydrocarbon hydrogenase (AHH) receptors for subsequent identification of responsive/non-responsive humans to dioxin exposure. Mice are classified as responsive with AHH receptors and non-responsive without the receptors. The responsive population manifests more types of toxicity and more severe toxicity in terms of interaction of chemicals and metabolism of chemicals to metabolites. Determining the presence of the receptor and its function is necessary for predicting interactions, and for relating animal data to human data. Also, epidemiology studies could take into account the responsive and non-responsive humans in defining the more dioxin-susceptible study groups.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0.0 K	$ 0.0 K	$ 40.0 K	$ 40.0 K	$ 0.0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Report on Chemical Evaluation of the AH Receptor Purity for Antibody Use.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: In Vitro Bioassay Procedures for PCDD and PCDF Compounds

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Steven H. Safe
Department of Veterinary Medicine
Texas A&M University
College Station, Texas 77843
Telephone: (409)845-7261

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Dr. K. Diane Courtney
Health Effects Research Laboratory (MD-67)
Research Triangle Park, North Carolina 27711
Telephone: (919) 541-2370

IDENTIFYING NUMBER: Task 72426D109 STARTING DATE: 1/1/86 COMPLETION DATE: 11/1/88

GOAL/RATIONALE/SCOPE: The goal is to evaluate in vitro tests as indicators of dioxin and furan toxicity. Reliable in vitro tests are needed with increased specificity and sensitivity. The work has established a cell line responsive to PCDDs and PCDFs. Research has evaluated both in vivo and in vitro toxicity tests and has found in vitro to be a good indicator of in vivo toxicity.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0.0 K	$ 20.0 K	$ 140.0 K	$ 0.0 K	$ 0.0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Five Journal articles, copies or references obtainable from D. Courtney.
Titles include: "Determination of 2,3,7,8-TCDD Equivalent Factors (TEFs): Support for the Use of the In Vitro AHH Induction Assay."

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Mechanism of dioxin toxicity (mice, rats, guinea pigs, hamsters, avian)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Stephen H. Safe 409-845-5988
Vet. Physiol. & Pharmacol.
Texas A & M University
College Station, TX 77843

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 ES03554-02 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE: The receptor-binding characteristics will be assessed of hepatic cytosol of guinea pigs, mice, rats and hamsters using a series of PCDDs. The in vivo biologic and toxic effects of selected PCDDs will be determined in these animals and compared to the in vitro receptor binding data. Also, the effects of modulating receptor levels in test animals on the biologic and toxic potencies of 2,3,7,8-TCDD will be investigated.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 60K	$ 60 K	$ 60 K	$ 60 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological) (Physiologic) Genetic (2378 TCDD) TCDD (PCDD) PCDF Other Compounds
	Properties	(Toxicity) Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air (Tissue) Food (Animal) Human Environmental Manufacturing Products Plant (Cell Cultures)
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY: 2,3,7,8-TCDD and related compounds and mechanisms of carcinogenicity

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Stephen H. Safe
Vet. Physiol & Pharmacol. 409-845-5988
Texas A&M University
College Station, TX 77843

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

G. Simon (202) 382-7445
U.S. EPA
Office of Exploratory Research

IDENTIFYING NUMBER: R81-3003-01 **STARTING DATE:** 9/2/86 **COMPLETION DATE:** 9/1/88

GOAL/RATIONALE/SCOPE:

To determine whether 2,3,7,8-TCDD and related PCDDS and PCDFs elicit covalent DNA adduct formation in rodent tissues in vivo. DNA adducts would indicate that these compounds are likely to induce cancer by a genotoxic mechanism.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 50K	$ 50 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Project has only just been initiated

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological) Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics (Physiologic) Genetic (2378 TCDD) TCDD (PCDD) (PCDF) Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air (Tissue) Food (Animal) Human Environmental Manufacturing Products Plant
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

TCDD -- Effects of receptor modulators/antagonists (mice, hamsters, guinea pigs)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Stephen H. Safe 409-845-5988
Vet. Physiol. & Pharmacol.
Texas A & M University
College Station, TX 77843

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 1R01 ES03843-01A1 STARTING DATE: 7/1/86 COMPLETION DATE: 6/30/89

GOAL/RATIONALE/SCOPE:

No abstract available.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 66 K	$ 66 K	$ 66 K	$ 66 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications and presentations

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological)
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Biological Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

(Physiologic)
Genetic

2378 TCDD
(TCDD)
PCDD
PCDF
Other Compounds

Standards
QA/QC
Methods Research

Wastes
Sludge
Soil
Sediment
Water
Air
Tissue

Food
(Animal)
Human
Environmental
Manufacturing Products
Plant
Cell Cultures

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: Exposure Assessment Methods for 2,3,7,8-TCDD

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR: Mr. John L. Schaum 202-382-5988
401 M Street, SW. (RD-689)
Washington, DC 20460

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)
U.S. Environmental Protection Agency
401 M Street, SW
Washington, DC 20460
Contact: Mr. John Schaum 202-382-5988

IDENTIFYING NUMBER: _____ STARTING DATE: 01/01/84 COMPLETION DATE: 12/01/85

GOAL/RATIONALE/SCOPE: The objective of this project has been to develop relevant likely scenarios through which humans could be exposed to 2,3,7,8-TCDD contaminated soil, to develop methods for estimating human exposure and to extend exposure assessment methods to include chemical-specific factors for dioxins and furans other than 2,3,7,8-TCDD. Exposure scenarios and assessment methods are needed to estimate dioxin and furan exposure under conditions likely to be encountered by man in his environment. Exposure assessment methods were developed for five principle pathways, including dust inhalation, fish ingestion, dermal absorption, soil ingestion, and beef/dairy product ingestion.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 145.0 K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

U.S. EPA. 1984. Risk Analysis of TCDD Contaminated Soil EPA-600/8-84-031; NTIS No. PB 84 146704/AS

U.S. EPA. 1985. Dioxin Transport from Contaminated Sites to Exposure Locations: A Methodology for Calculating Conversion Factors. EPA/600-8-85-012. NTIS No. PB 85 214310

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	(Assessment)	Environmental (Exposure) Body Burden Risk Effects	Monitoring (Pathways) Epidemiology (Transport/Mobility) Pharmacological	Physiologic Genetic (2378 TCDD) TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation (Bioavailability) Biotransformation	
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Regulation of intestinal metabolism

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

C. M. Schiller
National Institute of Environmental Health Sciences
Research Triangle Park, NC 27709

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

In-house project

IDENTIFYING NUMBER: 1Z01 ES70132-06 STARTING DATE: 10/1/79 COMPLETION DATE: 9/1/85

GOAL/RATIONALE/SCOPE:

To examine the effects of 2,3,7,8-TCDD on normal lipid assimilation using in vitro and in vivo techniques. Included are examination of (1) serum lipid, lipoprotein and triglyceride hydrolase, (2) relationship between food deprivation and hyperlipidemia, (3) mortality after chemically induced changes in serum and/or liver lipids, (4) serum lipoprotein binding by liver, (5) epithelical cell membrane proteins and glycoproteins. The project was terminated 9/1/85.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)		Environmental	Monitoring	(Physiologic)
		Exposure	Pathways	Genetic
	(Assessment)	Body Burden	Epidemiology	
		Risk	Transport/Mobility	(2378 TCDD)
		(Effects)	(Pharmacological)	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources		
			Wastes	Food
		Incineration	Sludge	(Animal)
		Detoxification	Soil	Human
	Destruction	Physicochemical	Sediment	Environmental
		Biological	Water	Manufacturing Products
		Environmental	Air	Plant
			(Tissue)	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY:

Environmental Fate and Transport of 2,3,7,8-TCDD

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Mr. Jerry M. Schroy
Monsanto Chemical Company
800 N. Lindbergh Blvd.
St. Louis, MO 63167, USA
(341) 694-6174

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Monsanto Company
(James D. Wilson - (314)694-8879)

IDENTIFYING NUMBER: _____ **STARTING DATE:** 6 / / 83 **COMPLETION DATE:** 10 / / 87

GOAL/RATIONALE/SCOPE:

Understand environmental fate of soil-bound TCDD.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 100 K	$55 K	$ 30 K	$ 0 K	$0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Immunotoxicologic Studies of Exposed Persons for Effects of Halogenated Dioxins and Related Compounds - Chemical - Analytical Survey

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Prof. Dr. F. Selenka, Lehrstuhl für Allgemeine und Umwelthygiene der Universität Bochum, Universitätsstraße 150, 4630 Bochum 1

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Gesellschaft für Strahlen- und Umweltforschung mbH München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089)3187-3372 (Dr. Ende)

IDENTIFYING NUMBER: 0764003 **STARTING DATE:** 01/05/87 **COMPLETION DATE:** 31/10/88

GOAL/RATIONALE/SCOPE:

Immunotoxicological Studies of humans - is there a relationship between PCDD/PCDF exposure and changed immunologic parameters?

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 101 K	$ 126 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

reports, publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	
	Analytical Methods	Sampling		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
Steroid and xenobiotic metabolism in the placenta (rats)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Kathleen T. Shiverick
University of Florida
Box J267 JHM Health Center
Gainesville, FL 32610
904-392-3545

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 HD18506-02 STARTING DATE: 12 / 1 / 84 COMPLETION DATE: 11 / 30 / 87

GOAL/RATIONALE/SCOPE:

To examine the effects of TCDD and other compounds on steroid hormone synthesis in intact placental tissue, and on microsomal enzymes involved in the metabolism of the prototype xenobiotic benzo(a)pyrene, and to study the effects of these compounds on the binding of (125I) EGF and (125I) insulin to placental membranes.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 76 K	$ 81 K	$ 65 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	(Assessment)	Environmental	Monitoring	(Physiologic)
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	(2378 TCDD)
		(Effects)	(Pharmacological)	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	(Animal)
	Destruction	Incineration	Soil	Human
		Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	(Tissue)	(Cell Cultures)
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

TCDD effects on steroid hormone synthesis in pregnancy (rats)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Kathleen T. Shiverick 904-392-3545
University of Florida
Box J-267 JHM Health Center
Gainesville, FL 32610

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 ES03766-02 STARTING DATE: 3/1/85 COMPLETION DATE: 2/28/88

GOAL/RATIONALE/SCOPE:

To further investigate the potential role of placental hypofunction and adrenal hyperfunction in mediating the adverse effects of TCDD on the fetus, and to evaluate whether TCDD treatment results in adverse effects on the binding of insulin and epidermal growth factor to placental membranes.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 43.7 K	$ 47 K	$ 49.1 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)		Environmental	Monitoring
		Exposure	Pathways
	(Assessment)	Body Burden	Epidemiology
		Risk	Transport/Mobility
		(Effects)	(Pharmacological)
			(Physiologic)
			Genetic
			(2378 TCDD)
			TCDD
			PCDD
			PCDF
	Properties	Toxicity	Bioaccumulation
		Synthesis	Bioavailability
		Physicochemical	Biotransformation
		Reactivity/Stability	Equivalency
	Analytical Methods	Biological	Chemicokinetics
		Sampling	
			(Other Compounds)
			Standards
			QA/QC
			Methods Research
B		Manufacturing	Emissions
		Incineration	Control Technology
	Sources	Internal Combustion Engines	
		End Products/Use	
		Other Sources	
			Wastes
			Sludge
			Soil
			Sediment
			Water
			Air
			(Tissue)
			Food
			(Animal)
			Human
			Environmental
			Manufacturing Products
			Plant
			(Cell Cultures)
		Incineration	
		Detoxification	
	Destruction	Physicochemical	
		Biological	
		Environmental	
	Waste Management	Interim Storage	
		Exposure Control	
C		Emergency	Decontamination
	Response	Remedial	Containment
		Contingency Planning	Health/Safety
			Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
FEASIBILITY STUDY OF THE APPLICATION OF THE TAGA 6000E GC/MS/MS SYSTEM TO THE RAPID SCREENING OF MUNICIPAL WASTE INCINERATOR COMBUSTION PRODUCTS FOR CDDs AND CDFs.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. B. Shushan (416-881-4646)
SCIEX
55 Glen Cameron Rd.
Thornhill, Ontario, CANADA L3T 1P2

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
V. Ozvacic (416-965-5776)
Ontario Ministry of Environment
Air Resources Branch
880 Bay St., 4th Floor
Toronto, Ontario, CANADA M5S 1Z8

IDENTIFYING NUMBER: _____ STARTING DATE: 01/04/85 COMPLETION DATE: 30/03/87

GOAL/RATIONALE/SCOPE:
Develop method for rapid on-site analysis of incinerator emissions for CDDs/CDFs with no prior cleanup by application of advanced instrumentation (GC-MS-MS).

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 70 K	$ 90 K	$ 10 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report, Journal Publications.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

orking Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDF PCB
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY: Lake Ontario Contaminant Trend Analysis

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Lawrence C. Skinner
NYS Dept. of Environmental Conservation
50 Wolf RD
Albany, NY 12233-4756 518-457-1769

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

New York State Dept. of Environmental Conservation
50 Wolf Road
Albany, NY 12233 ATTN: Lawrence C. Skinner
518-457-1769

IDENTIFYING NUMBER: _____ STARTING DATE: 4 / 1 / 87 COMPLETION DATE: 3 / 31 / 88

GOAL/RATIONALE/SCOPE:

1. Document changes in chemical contaminant levels in selected Lake Ontario fish species over time (including dioxin)
2. Apply knowledge of contaminant levels to decision-making for human health advisories.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0 K	$ 0 K	$ 75 K	$ 12 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		(Environmental)	(Monitoring)	Physiologic
		Exposure	Pathways	Genetic
	(Assessment)	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B				
		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources		
			Wastes	Food
		Incineration	Sludge	Animal
		Detoxification	Soil	Human
		Physicochemical	Sediment	Environmental
	Destruction	Biological	(Water)	Manufacturing Products
		Environmental	Air	Plant
			(Tissue)	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C				
	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Impact of disaster on children--Dioxin and flood

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Elizabeth M. Smith 314-362-2587
Washington University
4940 Audubon Avenue
St. Louis, MO 63110

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Susan Solomon
Public Health Service
NIMH

IDENTIFYING NUMBER: 1R01 MH40025-01 STARTING DATE: 2/1/86 COMPLETION DATE: 1/31/88

GOAL/RATIONALE/SCOPE:

To examine the psychosocial and psychiatric effects of disaster on children and their parents by conducting a controlled follow-up study of families with children, 3-18 years old, from three communities which experienced severe flooding. One site will be a confirmed dioxin site, one a suspected dioxin site and one an uncontaminated site.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 180 K	$ 120 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Reports and publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD (PCDD) PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal (Human) Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment (Health/Safety) (Surveillance/Monitoring)

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** United States of America

TITLE OF PROJECT OR ACTIVITY: Superfund/SARA Containment Facility

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
G. Wayne Sovocool, United States Environmental Protection Agency, Environmental Monitoring Systems Laboratory,
P.O. Box 15027, Las Vegas, Nevada 89114
(702) 798-2212

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
United States Environmental Protection Agency, Environmental Monitoring Systems Laboratory, P.O. Box 15027,
Las Vegas, Nevada 89114. Agency: (702) 798-2100
Project Officer: Anders Denson, (702) 798-2577

IDENTIFYING NUMBER: 68-03-3249, 70.27 **STARTING DATE:** 4/2/87 **COMPLETION DATE:** 9/30/89

GOAL/RATIONALE/SCOPE: The goal is to operate a hazardous materials containment facility in order to support Superfund/SARA (Superfund Amendments and Reauthorization Act of 1986) needs. This will permit the synthesis, safe manipulation and containment of potentially highly toxic compounds such as analytical standards and environmental samples containing chlorinated, brominated and bromochlorinated dioxin and dibenzofuran congeners.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ -- K	$ K	$ 200 K	$ 200 K	$ 200 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
This activity has just been initiated with the reauthorization of the Superfund Act. Publications are expected related to extension of RCRA 8280 analytical methodology to Superfund. Investigations of bromo- and bromochlorinated-dioxins and dibenzofurans in fly ash and other environmental samples are in progress. Synthesis and characterization of standards by retention index correlations and mass spectrometry are underway.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental Exposure	Monitoring	Physiologic
			Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Pollutant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: [bracket one] [A] B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Degradation of Persistent Environmental Pollutants by Ligninolytic Microorganisms

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

V.R. Srinivasan
Department of Microbiology
Louisiana State University
Baton Rouge, LA 70803-1715
(504-388-2601)

NAME, ADDRESS, AND TELEPHONE NUMBER OF SUPPORTING AGENCY (include name of Project Officer):

R.S. Kerr
USEPA, Environmental Research Laboratory
P.O. Box 1198
Ada, OK 74820/William J. Dunlap (405-332-8800)

IDENTIFYING NUMBER: CR-813088 STARTING DATE: 06/02/86 COMPLETION DATE: 12/01/87

GOAL/RATIONALE/SCOPE: To evaluate the capability of selected ligninolytic bacteria to degrade a representative group of diphenyl ethers and dibenzo-p-dioxins, as well as to study the properties and characteristics of aryl etherase enzyme produced by the organism selected to be capable of most efficient degradation.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 65 K	$ 32 K	$ K	$ K

MAJOR OUTPUTS (e.g., technical reports, other publications, patents):

KEY WORDS [bracket appropriate key words on reverse side]:

KEY WORDS [BRACKET APPROPRIATE KEY WORDS]

Working Group	Select one only	Select one	Select all that apply
[A]	[Assessment]	[Environmental] Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability [Biotransformation] Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD [PCDD] PCDF [Other Compounds] Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge [Soil] Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Epidemiologic Research on the health effects of Dioxin Exposure

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Alice Stark
2 University Place
Albany, Ny 12237

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

New York State Department of Health
(518) 458-6202

IDENTIFYING NUMBER: N/A STARTING DATE: 4/1/85 COMPLETION DATE: 4/31/89

GOAL/RATIONALE/SCOPE:

To study males diagnosed with lymphoma, who are of an age that would have permitted service in Vietnam, and an equal number of matched controls to identify if those diagnosed with lymphoma were more likely to have served in Vietnam.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$250,00 K	$ 250,000 K	$ 250,000 K	$ 250,000 K	$ 250,000 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publication in peer review journal

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods	Sampling		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.K.

TITLE OF PROJECT OR ACTIVITY: Determination of PCDDs and PCDFs in Herbage and Animal Tissues

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. J. R. Startin
MAFF, Old Bank of England Court,
Food and Pesticides Laboratory
Queen Street, NORWICH NR2 4SX

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Ministry of Agriculture, Fisheries and Food
Food Science Division
Great Westminster House,
Horseferry Road,
London SW1P ZAE

IDENTIFYING NUMBER: _____ STARTING DATE: -/3/86 COMPLETION DATE: -/-/91

GOAL/RATIONALE/SCOPE:

1. Sample and analyse range of PCDDs and PCDFs in background herbage.
2. Analysis of human milk (WHO project)
3. Subsequent cows milk and animal tissue studies

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ - K	$ 240 K	$ 160 K	$ 160 K	$ 160 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical reports; literature publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	(Assessment)	(Environmental) Exposure Body Burden Risk Effects	(Monitoring) Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	(Bioaccumulation) Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		(2378 TCDD) (TCDD) (PCDD) (PCDF) Other Compounds Standards (QA/QC) (Methods Research)
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY:
New Jersey Phase I and Phase II Dioxin Site Investigations

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Edward Stevenson, Program Manager
NJ Dept. of Environmental Protection (609) 984-6070
Office of Science and Research
401 E. State St., CN-409
Trenton, NJ 08625

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)
Edward Stevenson, Program Manager
NJ Dept. of Environmental Protection
Office of Science and Research (609) 984-6070
401 E. State St., CN-409
Trenton, NJ 08625

IDENTIFYING NUMBER: NA **STARTING DATE:** 04/00/83 **COMPLETION DATE:** 12/00/85

GOAL/RATIONALE/SCOPE: Investigation of "Phase I and Phase II" Sites of Potential Contamination including: 1) information review, 2) site reconnaissance, 3) sample collection, 4) analysis and 5) site assessment.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 425 K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

1) Project reports
2) Final reports for each site investigated

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
INVESTIGATION OF BIOLOGICAL MONITORS OF CDD/CDF CONTAMINATION IN THE ENVIRONMENT

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Mr. K. Suns (416-235-5798)
Ontario Ministry of Environment
Water Resources Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Dr. R.E. Clement (416-323-5896)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / / Uncertain

GOAL/RATIONALE/SCOPE:
Investigations in the use of various biomonitors for environmental contamination of CDDs/CDFs, including local fish, plants, and clams.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 10 K	$ 10K	$ 20 K	$ 10 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
Technical Reports, Journal Publication.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation	
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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Figure 1a

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Canada

TITLE OF PROJECT OR ACTIVITY:

Studies on hepatoxicity of TCDD and related substances

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

G. Sweeney

Hamilton, Ontario

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

IDENTIFYING NUMBER: _____ **STARTING DATE:** / / **COMPLETION DATE:** / /

GOAL/RATIONALE/SCOPE:

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ .01 K	$ .01 K	$ .01K	$ .01 K	$ .01 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Figure 1b

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** U.S.A.

TITLE OF PROJECT OR ACTIVITY:
NIOSH STUDY OF PERSISTENT HEALTH EFFECTS IN CHEMICAL HERBICIDE WORKERS AND IN COMMUNITY RESIDENTS OF UNKNOWN EXPOSURE STATUS

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
MARIE HARING SWEENEY, M.P.H.
NATIONAL INSTITUTE FOR OCCUPATIONAL SAFETY AND HEALTH
4676 Columbia Parkway, R-15
Cincinnati, Ohio 45226
PHONE: 513/841-4411

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
NATIONAL INSTITUTE FOR OCCUPATIONAL SAFETY AND HEALTH, DIVISION OF SURVEILLANCE, HAZARD EVALUATIONS & FIELD STUDIES, INDUSTRYWIDE STUDIES BRANCH, EPIDEMIOLOGY SECTION I, 4676 Columbia Parkway, R-15, Cincinnati, Ohio 45226
PHONE: 513/841-4411
CONTACT: MARIE HARING SWEENEY

IDENTIFYING NUMBER: _____ **STARTING DATE:** 3/5/87 **COMPLETION DATE:** 12/31/90

GOAL/RATIONALE/SCOPE:

THIS IS A MEDICAL EXAMINATION STUDY OF ABOUT 400 DIOXIN-EXPOSED CHEMICAL WORKERS AND 400 NEIGHBORHOOD COMPARISON PERSONS MATCHED BY AGE, SEX, AND RACE. ADDITIONALLY, REPRODUCTIVE EFFECTS WILL BE EVALUATED BY A QUESTIONNAIRE STUDY OF WIVES OF THE PARTICIPANTS.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 480 K	$ 265 K	$ 5,200 K	$ 850 K	$ 295 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:

METHOD FOR DETERMINATION OF PARTICULATE AND VAPOR-PHASE CDDs/CDFs IN AMBIENT AIR

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. A. Szakolcai (416-965-4081)
Ontario Ministry of Environment
Air Resources Branch
880 Bay St., 4th Floor
Toronto, Ontario, CANADA M5S 1Z8

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Dr. R.E. Clement(416-235-5896)
Dr. C. Tashiro (416-235-5847)

Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA / M9W-5L1

IDENTIFYING NUMBER: _____ STARTING DATE: 01 / 04 / 86 COMPLETION DATE: 30 / 03 / 88

GOAL/RATIONALE/SCOPE:

Develop Hi-Vol ambient air method with glass fibre filter and polyurethane foam cartridge to sample both particulate and vapor phase CDDs/CDFs. Determine trapping efficiencies, vapor:particulate distribution and precision by spiking studies and field tests.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 20 K	$ 50 K	$ 10 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report, Journal Publication

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds
	Analytical Methods	Sampling		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:

IMPROVED INSTRUMENTAL TECHNIQUES FOR ANALYSIS OF CDDs/CDFs

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. V. Taguchi (416-235-5902) and Mr. D. Schellenberg (416-235-5890)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.), Rexdale, Ontario, CANADA M9W 5L1

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Project Officer: Dr. R.E. Clement (416-235-5896)
Ontario Ministry of Environment
Same as Above

IDENTIFYING NUMBER: _____ STARTING DATE: 01/04/86 COMPLETION DATE: / / ONGOING DEVELOPMENT

GOAL/RATIONALE/SCOPE:

Investigations of advanced instrumental techniques for analysis of ultra-trace CDDs/CDFs in complex sample extracts; including MS-MS and HRMS-linked-scan techniques. Goals are to improve confidence of detection at ultra-low detection limits, and to achieve rapid analysis by reduced sample cleanup.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 50 K	$ 500 K	$ 500 K	$ 50 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Journal publications, technical reports

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDF PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:

IMPROVED CLEANUP METHODS FOR CDDs/CDFs IN COMPLEX SAMPLES

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. C. Tashiro (416-235-5897)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Project Officer: Dr. R.E. Clement (416-235-5896)
Ontario Ministry of Environment
same as above

IDENTIFYING NUMBER: _____ STARTING DATE: 01/09/86 COMPLETION DATE: / / Uncertain

GOAL/RATIONALE/SCOPE:

Improve sample cleanup methods for all CDD/CDF congeners in difficult sample types such as fish and other biota, sludge from pulp and paper industry, and heavily contaminated soils/sediments. Initital studies are based on carbon adsorption methodology.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 10 K	$ 30 K	$ 50 K	$ 20 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical reports, journal publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

orking Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCBs
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
TOTAL TOXIC CONGENER CDD/CDF ANALYSIS OF FISH AND OTHER MATRICES

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. C. Tashiro (416-235-5897)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)

Project Officer: Dr. R.E. Clement
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: _____ STARTING DATE: 27/02/87 COMPLETION DATE: 31/03/88

GOAL/RATIONALE/SCOPE:
To develop a cost-effective method of definitive analysis for all toxic CDD/CDF congeners in fish and other samples using HPLC, carbon cleanup, and commercially available 30-M fused silica columns. Future automation of the system is planned.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 20 K	$ 20 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report, Journal Publication.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Toxicity of 2,3,7,8-TCDD and isosteromers in human adipose tissue

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. R. Theelen and dr. J.G. Vos, National Institute of Public Health and Environmental Hygiene

P.O. Box 1, 3720 BA BILTHOVEN

tel. (30) 742752

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

IDENTIFYING NUMBER: 618507 **STARTING DATE:** 01 /04 /86 **COMPLETION DATE:** 31 /12 /88

GOAL/RATIONALE/SCOPE: Estimation of the risk of biological filtered PCB, PCDD and PCDF mixtures especially for sucklings

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 25 K	$ 50 K	$ 50 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

reports for public health officers

publication in international scientific journals

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
INVESTIGATION OF CDDs/CDFs AND OTHER ORGANICS IN TYPICAL ONTARIO FOOD SUPPLIES:FOOD BASKET SURVE)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Ms. B. Thorpe (416-323-5104)
Ontario Ministry of Environment
Hazardous Contaminants Coordination Branch
40 St. Clair Ave. W., 7th Floor
Toronto, Ontario, CANADA M9W 5L1

Dr. R. Frank (519-823-8800)
Ontario Ministry of Agriculture and Food
Agricultural Laboratory Services
Building #43 McGilvray St. c/o University of
Guelph, Ontario CANADA N1G 2W1 Guelph

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Dr. R.E. Clement (416-235-5896)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: _____ STARTING DATE: 01/09/86 COMPLETION DATE: 30/09/87

GOAL/RATIONALE/SCOPE:
To study the levels of CDDs/CDFs and other organics in common food products, and identify any food types that may need additional detailed investigation.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 10 K	$ 50 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report, Journal Publications.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	
	Analytical Methods			Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: U.S.A.

TITLE OF PROJECT OR ACTIVITY: Method 8290: An analytical protocol for the multimedia characterization of polychlorinated dibenzodioxins and dibenzofurans by high-resolution gas chromatography/high-resolution mass spectrometry

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Yves Tondeur 919-544-5729
Triangle Laboratories
4915 F Prospectus Drive
Research Triangle Park, NC 27713

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Werner F. Beckert, P.O. 702-798-2137
Environmental Protection Agency
EMSL-LV
P.O. Box 15027
Las Vegas, NV 89114-5027

IDENTIFYING NUMBER: _____ STARTING DATE: __/__/86 COMPLETION DATE: __/__/87

GOAL/RATIONALE/SCOPE:

To develop and evaluate in a single laboratory a protocol for the determination of tetra-through octachlorinated dibenzodioxins and dibenzofurans, using HRGC/HRMS techniques.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 40 K	$ 140 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical report, publication

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	(Environmental) Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	(Analytical Methods)		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

Physiologic
Genetic

(2378 TCDD)
(TCDD)
(PCDD)
(PCDF)
Other Compounds

Standards
(QA/QC)
(Methods Research)

(Wastes)
(Sludge)
(Soil)
(Sediment)
(Water)
Air
(Tissue)

Food
Animal
Human
Environmental
Manufacturing Products
Plant
Cell Cultures

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Dioxins and furans in sediment and fish

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

DBW/RIZA, E. Turkstra, P.O. Box 510, 3300 AM DORDRECHT, The Netherlands

tel. (78) 132266

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

IDENTIFYING NUMBER: BO.5129 **STARTING DATE:** 01 / 06 / 84 **COMPLETION DATE:** / /

GOAL/RATIONALE/SCOPE: Monitoring of dioxins in suspended matter, sediment and fish in the rivers Rhine and Meuse

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 25 K	$ 5 K	$ 15 K	$ 10 K	$ 10 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical reports

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	(Assessment)	(Environmental) Exposure, Body Burden, Risk, Effects	(Monitoring), Pathways, Epidemiology, Transport/Mobility, Pharmacological, Physiologic, Genetic
	Properties	Toxicity, Synthesis, Physicochemical, Reactivity/Stability, Biological, Sampling	2378 TCDD, TCDD, PCDD, PCDF, Other Compounds
	Analytical Methods		Bioaccumulation, Bioavailability, Biotransformation, Equivalency, Chemicokinetics, Standards, QA/QC, Methods Research
B	Sources	Manufacturing, Incineration, Internal Combustion Engines, End Products/Use, Other Sources	Emissions, Control Technology
	Destruction	Incineration, Detoxification, Physicochemical, Biological, Environmental	Wastes, Sludge, Soil, (Sediment), Water, Air, (Tissue), Food, (Animal), Human, Environmental, Manufacturing Products, Plant, Cell Cultures
	Waste Management	Interim Storage, Exposure Control	
C	Response	Emergency, Remedial, Contingency Planning	Decontamination, Containment, Health/Safety, Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** United States

TITLE OF PROJECT OR ACTIVITY: U.S. Environmental Protection Agency's Standards Repository

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Jack Tuschall
2 Triangle Drive
Research Triangle Park, NC 27711

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Edward J. Kantor
U.S. EPA/ Environmental Monitoring Systems Laboratory
944 E. Harmon Avenue
Las Vegas , Nevada 89109

IDENTIFYING NUMBER: 68-03-3206 **STARTING DATE:** 1/1/85 **COMPLETION DATE:** 12/31/99

GOAL/RATIONALE/SCOPE:

Goal: To provide QA/QC support for Superfund and RCRA Dioxin Monitoring Programs
Rationale: Help assure known quality data by supplying dioxin standards for EPA monitoring needs
Scope: The repository will formulate, prepare, and distribute analytical reference dioxin standards for use by E.P.A.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 60 K	$ 80 K	$ 110 K	$ 100 K	$ 100 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Annual Reports on the Quality Assurance Materials Bank

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: Netherlands

TITLE OF PROJECT OR ACTIVITY: Quality assurance and quality control of the determination of 2,3,7,8-TCDD in soil, sediment and water

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. G. van de Werken, National Institute of Public Health and Environmental Hygiene
P.O. Box 1, 3720 BA BILTHOVEN
tel. (30) 742709

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

IDENTIFYING NUMBER: 638704 STARTING DATE: 04 / 01 / 87 COMPLETION DATE: 01 / 01 / 88

GOAL/RATIONALE/SCOPE: Standard operation procedure for QA and QC in relation to the determination of 2,3,7,8- TCDD

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 40 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

standard operation procedure

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		(Environmental)	(Monitoring)	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	(2378 TCDD)
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	(Analytical Methods)	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	(QA/QC)
		Sampling		(Methods Research)
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	(Soil)	Human
		Detoxification	(Sediment)	Environmental
	Destruction	Physicochemical	(Water)	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Toxicokinetics of PCDD and PCDF

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. M. van den Berg, Department of Veterinary Pharmacology, Pharmacy and Toxicology
State University of Utrecht, P.O. Box 80176, 3508 TD UTRECHT
tel. (30) 733614

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Ministry of Housing, Physical Planning and Environment, P.O. Box 450, 2260 MB LEIDSCHENDAM
dr. J.A. van Zorge
tel. (70) 209367 ext. 2840

IDENTIFYING NUMBER: _____ **STARTING DATE:** 01 /06 /87 **COMPLETION DATE:** __/__

GOAL/RATIONALE/SCOPE: Several toxicokinetical studies in mamals and fish in the laboratory as well as in the environment

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 75 K	$ 75 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical reports, publication in scientific journals

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds
	Analytical Methods	Biological Sampling		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Toxicological evaluation in laboratory animals of 2,3,7,8-TCDD and isosteric compounds in fly ash

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. C.A. van der Heijden, National Institute of Public Health and Environmental Hygiene
P.O. Box 1, 3720 BA BILTHOVEN
tel. (30) 742080

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)

Ministry of Housing, Physical Planning and Environment, P.O. Box 450, 2260 MB LEIDSCHENDAM
dr. J.A. van Zorge
tel. (70) 209367 ext. 2840

IDENTIFYING NUMBER: 658301 **STARTING DATE:** 01 /01 /83 **COMPLETION DATE:** 31 /12 /88

GOAL/RATIONALE/SCOPE: determination of the bioavailability of 2,3,7,8-TCDD in fly ash

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 50 K	$ 50 K	$ 50 K	$ 25 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Dioxins in sediment and fish in a Rotterdam harbour

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Rijks Waterstaat Directie Benedenrivieren,
R.H. van Otterloo, P.O. Box 137, 3300 AC DORDRECHT, The Netherlands
tel. (78) 132266

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

University of Utrecht
dr. M. van den Berg
P.O. Box 80176
3508 TD UTRECHT

University of Amsterdam
dr. K. Olie
Nieuwe Achtergracht 166
1018 WV AMSTERDAM

IDENTIFYING NUMBER: _____ **STARTING DATE:** 01 /11 /86 **COMPLETION DATE:** 01 /07 /87

GOAL/RATIONALE/SCOPE: Determination of the distribution pattern and the quantity of dioxins in the sediment of a Rotterdam harbour. Estimation of risks to human health by measuring dioxin levels in eel from that harbour and by carying out laboratory experiments on carp.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 130 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	(Assessment)	Body Burden	Epidemiology	
		(Risk)	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				(PCDD)
				(PCDF)
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	(Animal)
		Incineration	Soil	Human
		Detoxification	(Sediment)	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	(Tissue)	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
"Development of an Immunoassy for Chlorinated Dioxins Based on a Monoclonal Antibody and an Enzyme Linked Immunosorbent Assay (ELISA)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Martin Vanderlaan, Lawrence Livermore National Laboratory, Biomedical and Environmental Science Division, P.O. Box 5507, Livermore, CA 94550 415-422-5721

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

William L. Budde, Ph.D., U.S. Environmental Protection Agency, Physical and Chemical Methods Branch, Advanced Instrumentation Section, 26 W. St. Clair St., Cincinnati, Ohio 45268 513-569-7309

IDENTIFYING NUMBER: _____ STARTING DATE: 07 / 01 / 85 COMPLETION DATE: 06 / 30 / 88

GOAL/RATIONALE/SCOPE:
Currently used analytical methods are complex, costly, and require skilled research-level laboratory personnel and expensive equipment. Immunoassays have the demonstrated potential of providing inexpensive rapid assays which can be used in the field to screen samples.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 95,300 K	$ 100,000 K	$ 149,940 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
"Monoclonal Antibodies for Dioxin: Antibody Characterization and Assay Development," L.H. Stanker, B. Watkins, N. Rogers, and M. Vanderlaan. Prepared for publication in "Toxicology."

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
	Destruction	Incineration	Soil	Human
		Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Effect of 2,3,7,8-TCDD on thymic epithelium

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. J.G. Vos, National Institute of Public Health and Environmental Hygiene
P.O. Box I, 3720 BA BILTHOVEN
tel. (30) 742476

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

IDENTIFYING NUMBER: 158105 **STARTING DATE:** 01 /05 /86 **COMPLETION DATE:** 31 /12 /87

GOAL/RATIONALE/SCOPE: to investigate the mechanism of thymus involution induced by dioxin

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 25 K	$ 25 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

publication in international scientific journal

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological) Physiologic Genetic (2378 TCDD) TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:

Bioavailability and fate of selected PCDDs in an experimental aquatic ecosystem

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

G.R. Barrie Webster (204) 474-6039
Pesticide Research Laboratory, Dept. of Soil Science
University of Manitoba, Winnipeg, MB Canada R3T 2N2

+ K.J. Friesen

D.C.G. Muir (204) 983-5168
Freshwater Institute, Dept. of Fisheries & Oceans
501 University Cres., Winnipeg, MB Canada R3T 2N6

+ M.R. Servos

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Natural Sciences and Engineering Research Council of Canada
200 Kent Street
Ottawa, ON Canada K1A 1H5

IDENTIFYING NUMBER: NSERC G 1505 STARTING DATE: 84/11/01 COMPLETION DATE: 87/10/31

GOAL/RATIONALE/SCOPE:

To determine and describe the aquatic environmental fate of selected chlorinated dibenzo-p-dioxins in outdoor aquatic mesocosms, representing both prairie sloughs (eutrophic) and precambrian shield lakes (oligotrophic). Congeners examined include 1,3,6,8-T_4CDD; 1,2,3,4,7-P_5CDD; 1,2,3,4,7,8-H_6CDD; and 1,2,3,4,6,7,8-H_7CDD; and O_8CDD.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 40 K	$40 K	$40 K	$0 K	$0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Ph.D. thesis M.R. Servos 1987 pending
Ph.D. thesis K.J. Friesen 1987 pending
M.Sc. thesis L. Marcheterre 1985

L. Marcheterre, G.R.B. Webster, D.C.G. Muir, and N.P. Grift. 1985. Fate of ^{14}C-Octachlorodibenzo-p-dioxin in Artificial Outdoor Ponds. Chemosphere 14:835-838.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
	Assessment	Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
			Fish	1,3,6,8-T_4CDD
			Methods research	1,2,3,4,7-P_5CDD
			Environmental photochemistry	1,2,3,4,7,8-H_6CDD
B		Manufacturing	Emissions	1,2,3,4,6,7,8-H_7CDD
	Sources	Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources		
			Wastes	Food
		Incineration	Sludge	Animal
		Detoxification	Soil	Human
	Destruction	Physicochemical	Sediment	Environmental
		Biological	Water	Manufacturing Products
		Environmental	Air	Plant
			Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: Canada FE 19

TITLE OF PROJECT OR ACTIVITY:

Availability, bioconcentrations, and transformations of PCDDs in sediments and aquatic systems.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

G.R. Barrie Webster (204) ~~474-6039~~ 997-6039
Pesticide Research Laboratory, Dept. of Soil Science
University of Manitoba, Winnipeg, MB Canada R3T 2N2

D.C.G. Muir (204) 983-5168
Freshwater Institute, Dept. of Fisheries & Oceans
501 University Cres., Winnipeg, MB Canada R3T 2N6

+ K.J. Friesen, D.H. Muldrew, L.P. Sarna, G.G. Choudhry

+ M.R. Servos, A.L. Yarechewski

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Keith Marshall
Canadian Wildlife Service
Ottawa, ON Canada K1A 0E7
(819) 997-6079

IDENTIFYING NUMBER: OSU 82-00277 (Contract No. with DSS) STARTING DATE: 82/04/01 COMPLETION DATE: 85/08/31

GOAL/RATIONALE/SCOPE:

To determine the physical and chemical constants and properties (viz., water solubility, partition coefficients, vapor pressure, Henry's constant, quantum yield) of a series of polychlorinated dibenzo-p-dioxins to enable aquatic environmental fate modelling studies to be conducted.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 25 K	$ 0 K	$ 0 K	$ 0 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

(See attached page)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Fate Water solubility Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Partition coefficients Vapor pressure Henry's constants Quantum yield Emissions Control Technology Modelling Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research 1,3,6,8-T_4CDD 1,2,3,7-T_4CDD 1,2,3,8-T_4CDD 1,2,3,4,7-P_5CDD 1,2,3,4,7,8-H_6CDD 1,2,3,4,6,7,8-H_7CDD O_8CDD ^{14}C
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Development and optimization of methods for the determination of PCDD and PCDF in environmental samples

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. R.C.C. Wegman, National Institute of Public Health and Environmental Hygiene
P.O. Box 1, 3720 BA BILTHOVEN
tel. (30) 742871

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Ministry of Wellfare, Health and Cultural Affairs, P.O.Box 5406, 2280 HK RIJSWIJK
dr. J. van der Kolk
tel. (70) 407911

IDENTIFYING NUMBER: 840814 **STARTING DATE:** 01 /01 /86 **COMPLETION DATE:** 01 /01 /88

GOAL/RATIONALE/SCOPE: Methods for the determination of PCDD and PCDF in environmental samples described in QA/QL protocols

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 50 K	$ 50 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report, publication in scientific journal

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		(Environmental)	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	(2378 TCDD)
		Effects	Pharmacological	(TCDD)
				(PCDD)
				(PCDF)
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	(Analytical Methods)	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	(QA/QC)
		Sampling		(Methods Research)
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	(Wastes)	Food
			(Sludge)	Animal
		Incineration	(Soil)	Human
		Detoxification	(Sediment)	(Environmental)
	Destruction	Physicochemical	Water	(Manufacturing Products)
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Optimization of a quantitative method for the detremination of twelve PCDD and PCDF congeners in human milk and fat tissue

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. R.C.C. Wegman, National Institute of Public Health and Environmental Hygiene
P.O. Box 1, 3720 BA BILTHOVEN
tel. (30) 742871

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Ministry of Helth, Wellfare and Cultural Affairs, P.O. Box 5406, 2280 HK RIJSWIJK
dr. J. van der Kolk
tel. (70) 407911

IDENTIFYING NUMBER: 638705 **STARTING DATE:** 01/01/87 **COMPLETION DATE:** 01/01/89

GOAL/RATIONALE/SCOPE: Standard operation procedure for the determination of twelve PCDD and PCDF congeners in human milk and fat tissue

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1.000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 40 K	$ 40 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure (Body Burden) Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic (2378 TCDD) (TCDD) (PCDD) (PCDF)
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Other Compounds
	(Analytical Methods)		Standards (QA/QC) (Methods Research)
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air (Tissue) (Food) Animal (Human) Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment (Health/Safety) (Surveillance/Monitoring)

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: PCDD and PCDF in human milk

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. R.C.C. Wegman, National Institute of Public Health and Environmental Hygiene
P.O. Box 1, 3720 BA BILTHOVEN
tel. (30) 742871

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Ministry of Wellfare, Health and Cultural Affairs, P.O.Box 5406, 2280 HK RIJSWIJK
dr. J. van der Kolk
tel. (70) 407911

IDENTIFYING NUMBER: 638601 **STARTING DATE:** 01/01/87 **COMPLETION DATE:** 01/01/88

GOAL/RATIONALE/SCOPE: Participation to WHO-Europe round robin test for determination of PCDD and PCDF in human milk
Surveillance study of PCDD and PCDF in dutch human milk samples

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 50 K	$ 150 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report, publication in scientific journal

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Control of gene expression by dioxin (mice)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

James P. Whitlock, Jr.
Stanford University
Department of Pharmacology
Stanford, CA 94305

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 5R01 ES03719-02 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

No abstract available.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 199 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Physiologic (Genetic) 2378 TCDD (TCDD) PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue.
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Food (Animal) Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY: GREAT LAKES FISH CONTAMINANTS MONITORING PROGRAM

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
D.M. Whittle
416-336-4565
D.B. Sergeant
416-336-4863
Dr. A. Niimi (Kinetics)
416-336-4868

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)
Director's Office: 416-336-4568
Department of Fisheries and Oceans
Great Lakes Laboratory for Fisheries and Aquatic Sciences
Central and Arctic Region
867 Lakeshore Rd., P.O. Box 5050
Burlington, Ontario L7R 4A6

IDENTIFYING NUMBER: N/A STARTING DATE: 14/02/83 COMPLETION DATE: 31/03/90

GOAL/RATIONALE/SCOPE: Annual assessment of the extent of dioxin and furan contamination (all isomers) of Great Lakes fish and forage base.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986/87	1987/88	1988	1989
FUNDING	$ 60.0 K	$ 60.0 K	$ 60.0 K	$? K	$? K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
- Biennial reports by the Surveillance Workgroup to the Water Quality Board of the International (Canada/United States) Joint Commission and annual reports to the Lake Committees of the Great Lakes Fishery Commission regarding monitoring of chlorinated dioxins and dibenzofurans in fish from the Great Lakes Basin.
- Technical reports, presentations, and primary literature publications on the kinetics of dioxins and related compounds.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)		Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Assessment		
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
B		Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Sources		
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C		Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring
	Response		

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: Canada

TITLE OF PROJECT OR ACTIVITY: Human Tissue Analysis

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. D.T. Williams
Environmental Health Centre
Tunney's Pasture, Ottawa, Ontario
K1A 0L2 Telephone: (613) 957-3126

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Dr. D.T. Williams
Environmental Health Directorate
Health Protection Branch
Health and Welfare Canada Telephone: (613) 957-3126

IDENTIFYING NUMBER: None STARTING DATE: 04/01/87 COMPLETION DATE: 03/31/88

GOAL/RATIONALE/SCOPE:

To analyze human tissue samples for PCDD/PCDF as an aid to estimation of human exposure to these compounds.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 100 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications in scientific literature.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) x x x x x **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
New Processes and Methods for Remedial Measures of Abandoned Sites Demonstrated at the Landfill Georgswerder (subproject)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
K. Wolf, Freie und Hansestadt Hamburg, Baubehörde, Postfach 30 05 80,
2000 Hamburg 36, (040) 349 13-1

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Umweltbundesamt, Bismarckplatz 1, 1000 Berlin 33, (030) 8903-261, (Ch. Nels)

IDENTIFYING NUMBER: 144 03 93 1/1 **STARTING DATE:** 1 / 1 / 86 **COMPLETION DATE:** 31 / 12 / 88

GOAL/RATIONALE/SCOPE:
Development of methods for the analysis of PCDD/PCDF in landfill disposals

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ K	$ 437 K	$ 437 K	$ 437 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
	Destruction	Incineration	Soil	Human
		Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
Air Force Health Study - An Epidemiologic Investigation of Health Effects in Air Force Personnel Following Exposure to Herbicides (Ranch Hand II)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
William H. Wolfe, Col, USAF, MC 512/536-2604; AUTOVON 240-2604
USAFSAM/EK
Brooks AFB TX 78235-5301

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)
Richard H. Stoller, Col, USAF, SFS 202/767-1848; AUTOVON 297-1848
HQ USAF/SGPA
Bolling AFB DC 20332-6188

IDENTIFYING NUMBER: PMD R-Q 1092 (3) STARTING DATE: 1 /Oct/1981 COMPLETION DATE: /Dec /2002

GOAL/RATIONALE/SCOPE:
The purpose of the Air Force Health Study is to determine whether those individuals involved in the aerial spraying of herbicides in Vietnam during the Ranch Hand operation have experienced any adverse health effects as a result of their participation in that program. The study evaluates both mortality (death) and morbidity (disease) in these individuals over a 20-year period after 1982.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$6,1 K	$4.8 K	$ 7.1 K	$ 5.8 K	$ 1.8 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
Mortality assessments reported annually 1982-1987 and periodic updates planned throughout duration of the study.
Morbidity assessments reported in Feb 84 for data collected at the 1982 physical examiation. Reports expected in 1987, 1989, 1994, 1999, and 2004 following subsequent examinations.

Atch 1

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Placental markers of exposure to toxic halogenated aromatics

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

T. Wong
NIEHS, NIH

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

In-house project

IDENTIFYING NUMBER: 1Z01 ES46006-01 STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

To evaluate the congener-dependency of some of the biochemical effects observed with human exposure to halogenated aromatics (PCDFs and PCBs) and the role of receptor(s) in mediating the biologic and toxic effects in placental tissue.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
(A)	(Assessment)	Environmental	Monitoring	(Physiologic)
		(Exposure)	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		(Effects)	Pharmacological	TCDD
				PCDD
				(PCDF)
	Properties	Toxicity	Bioaccumulation	(Other Compounds)
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
	Destruction	Incineration	Soil	(Human)
		Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	(Tissue)	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C **COUNTRY OF ORIGIN:** WHO Regional Office for Europe

TITLE OF PROJECT OR ACTIVITY: Analytical Studies on Levels of PCBs, PCDDs and PCDFs in Human Milk in Different Geographic Areas

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. E. Yrjanheikki (coordinator) and Dr. S. Tarkowski
WHO Regional Office for Europe
8 Scherfigsvej
2100 Copenhagen 0 Tel: (01) 290111

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

WHO Regional Office for Europe and participating countries

IDENTIFYING NUMBER: _____ **STARTING DATE:** 1/2/86 **COMPLETION DATE:** 30/12/87

GOAL/RATIONALE/SCOPE: To produce more reliable and comparable data on levels of PCBs PCDDs and PCDFs in human milk in different geographic areas for further efforts on assessment of health risks in infants associated with contamination of human milk.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ Supported by participating countries. K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Report on interlaboratory quality control studies on levels of PCBs, PCDDs and PCDFs in human milk (10 participating laboratories).
Report on levels of PCBs, PCDDs and PCDFs in human milk in different geographic areas.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
	Destruction	Incineration	Soil	Human
		Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: WHO Regional Office for Europe

TITLE OF PROJECT OR ACTIVITY: Epidemiological Studies on Health Effects in Infants Associated with Exposure to PCBs, PCDDs and PCDFs in Human Milk

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. E. Yrjanheikki (coordinator) and Dr. S. Tarkowski
WHO Regional Office for Europe
8 Scherfigsvej
2100 Copenhagen 0 Tel: (01) 290111

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

WHO Regional Office for Europe and collaborating centres in participating countries.

IDENTIFYING NUMBER: _____ STARTING DATE: 1/7/86 COMPLETION DATE: __/__/__

GOAL/RATIONALE/SCOPE: To plan and implement epidemiological studies to determine any possible health effects in infants caused by exposure to PCBs, PCDDs and PCDFs in human milk, and to determine what is the risk to infants exposed to the presently found levels of the above substances in human milk

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

Supported by participating countries

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Report on planning meeting on epidemiological studies including study protocol. To be published in WHO/EUOR Environmental Health Series by the end of 1987.
Studies on health effects to be started in 1988.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: WHO Regional Office for Europe

TITLE OF PROJECT OR ACTIVITY: Assessment of Health Risks in Infants Associated with Exposure to PCBs, PCDDs and PCDFs in Human Milk

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. E. Yrjanheikki (coordinator) and Dr. S. Tarkowski
WHO Regional Office for Europe
8 Scherfigsvej
2100 Copenhagen 0 Tel: (01) 290111

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

WHO Regional Office for Europe and Regione del Veneto

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE: To assess the possible health risks in infants caused by exposure to PCBs, PCDDs and PCDFs in human milk and to give guidance to the authorities and the public in this regard, as well as to improve management of health risks in infants.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ WHO/EURO Support and US$22,000 from Regione del Veneto, ITALY				

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Report on health risks in infants associated with exposure to PCBs, PCDDs and PCDFs in human milk based on present knowledge (will be ready by 31.5.87).

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: TCDD alteration in gene expression and cleft palate (mice)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Ernest F. Zimmerman
Children's Hospital Medical Center
Elland and Bethesda Avenues
Cincinnati, OH 45229

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Public Health Service

IDENTIFYING NUMBER: 1R03DE07852-01 STARTING DATE: 8/1/86 COMPLETION DATE: 7/31/87

GOAL/RATIONALE/SCOPE:

To test whether TCDD mimics EGF and stimulates EGF in mouse palate mesenchymal cells in culture.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 15 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	(Assessment)	Environmental Exposure Body Burden Risk (Effects)	Monitoring Pathways Epidemiology Transport/Mobility (Pharmacological) Physiologic (Genetic) 2378 TCDD (TCDD) PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: Canada

TITLE OF PROJECT OR ACTIVITY:
Organic Contaminants in N. Atlantic Fish

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

V. Zitko
DFO Biological Station
St. Andrews, New Brunswick
E0G 2X0
Telephone: (506) 529-8854

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

IDENTIFYING NUMBER: _____ STARTING DATE: / / 82 COMPLETION DATE: Continuous

GOAL/RATIONALE/SCOPE:
Methodology, exposure determination.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 7.5 K	$ 7.5 K	$ 5 K	$ 5 K	$ 5 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical reports and scientific publications.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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Working Group B

Technology Assessment

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Biodegradation of Environmental Pollutants

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Steven D. Aust
Department of Biochemistry
Michigan State University
East Lansing, MI 48824

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

P. R. Sferra 513-569-7618
Environmental Protection Agency
HWERL-CIN
26 West St. Clair Street
Cincinnati, OH 45268

IDENTIFYING NUMBER: CR811464 STARTING DATE: 6/1/86 COMPLETION DATE: 5/31/89

439.0

GOAL/RATIONALE/SCOPE:

The biological oxidation of persistent environmental pollutants by white rot fungi such as Phanerochaete chrysosporium.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 160 K	$ 160 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation	Other Compounds
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Netherlands

TITLE OF PROJECT OR ACTIVITY: Sreening sources on dioxins

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
DBW/RIZA, V. Bakker, P.O. Box 17, 8200 AA LELYSTAD, The Netherlands
tel. (3200) 70449

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

IDENTIFYING NUMBER: _____ STARTING DATE: 01 /03 /87 COMPLETION DATE: 01 /09 /87

GOAL/RATIONALE/SCOPE: Since dioxins have been detected in harbour sediments in the Rotterdam area all sources around this harbour will be screened on the possible presence of dioxins (desk study)

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods	Sampling		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) xA (B) xC **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Contribution of Motor Vehicle Emissions to the General Load on the Environment by Polychlorinated Dibenzodioxins (PCDD) and Furanes (PCDF)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Dr. K. Ballschmiter, Abteilung Analytische Chemie der Universität Ulm, Oberer Eselsberg, 7900 Ulm, (0731)176-2180

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Gesellschaft für Strahlen- und Umweltforschung mbH München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089)3187-3372 (Dr. Ende)

IDENTIFYING NUMBER: 07 64 004 **STARTING DATE:** 01/10/87 **COMPLETION DATE:** 30/09/90

GOAL/RATIONALE/SCOPE:
Inventory of the PCDD/PCDF occurrence in urban and rural areas

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 28 K	$ 189 K	$ 189 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
reports, publications

KEY WORDS: (circle appropriate key words on reverse side)

Figure 4

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) ~~(A)~~ (B) **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Analysis of Causes and Reduction of PCDD/PCDF of a Waste Incinerator in Hamburg

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. K. Ballschmitter, Universität Ulm, Oberer Eselsberg 026, Postfach 40 66, 7900 Ulm, (0731) 176-2181

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
K. Wolf, Freie und Hansestadt Hamburg, Baubehörde, Postfach 30 05 80, 2000 Hamburg 36, (040) 349 13-1

IDENTIFYING NUMBER: R 502 **STARTING DATE:** 1/7/85 **COMPLETION DATE:** 31/12/86

GOAL/RATIONALE/SCOPE:
Determination of PCDD/PCDF and other organic substances in the exhaust gas of waste incineration plants as lead components for PCDD/PCDF emissions

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1988
FUNDING	$ 106 K	$ 300 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
X	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemokinetics	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties Analytical Methods	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
Biotechnology Approaches to Detoxification of 2,3,7,8-Tetrachlorodibenzo-p-dioxin (TCDD) Contaminated Soils

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. Richard Bartha, Mr. Paul Meyer (Grad Student)
Dept. of Microbiology and Biochemistry
Rutgers University, Cook College

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Noemi de la Puente, Project Manager
Office of Science and Research
NJ Dept. of Environmental Protection (609) 984-6070
401 E. State St., CN-409
Trenton, NJ 08625
IDENTIFYING NUMBER: C29527 - contract dispersal STARTING DATE: 06/01/86 COMPLETION DATE: 07/01/87

GOAL/RATIONALE/SCOPE: This study will manipulate the environmental conditions surrounding 2,3,7,8-TCDD contaminated soil, in an attempt at encouraging biochemical dechlorination and ultimate mineralization of 2,3,7,8-TCDD.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 34,466 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
Final report, publication in an environmental or microbiological refereed journal

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation	
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: ITALY

TITLE OF ~~PROJECT~~ OR ACTIVITY: Characterization of organic compounds in flue gas emitted by thermoelectrical Power Stations (oil, coal, metnane)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

BINECCHIO Luisa ENEL-DCO Unità Laboratorio - Piacenza
Via Nino Bixio, 39 - PIACENZA - Italia -
Telefono : 0523-38203

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

ENEL-DCO Unità Laboratorio - Piaacenza
Via Nino Bixio, 39 - PIACENZA - Italia -
Telefono : 0523-38203

IDENTIFYING NUMBER: //// STARTING DATE: 01 / 01 / 86 COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

SEE TITLE

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 80 K	$ ~~80.000~~ 150 K	$ ~~100.000~~ 200 K	$ 105 K	$ 150 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

INTERNAL TECHNICAL REPORTS

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Waste Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Netherlands

TITLE OF PROJECT OR ACTIVITY: Prevention of exposure of workers to fly ash

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

ir. C. Boeckhout, TAUW Infra Consult bv, P.O. Box 479, 7400 AL DEVENTER

tel. (5700) 99911

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Directorate-General for Labour, P.O. Box 69, 2270 MA VOORBURG

dr. T. Spee

tel. (70) 694001

IDENTIFYING NUMBER: 52578.01 STARTING DATE: 01/01/87 COMPLETION DATE: 01/07/87

GOAL/RATIONALE/SCOPE: Preparation of an information bulletin and a directive concerning the prevention of workers to exposure of fly ash in municipal incinerators

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 18 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

information bulletin

directive

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency
	Analytical Methods	Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions (Control Technology)
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	(Wastes) Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products (Plant) Cell Cultures
	(Waste Management)	Interim Storage (Exposure Control)	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment (Health/Safety) Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Canada

TITLE OF PROJECT OR ACTIVITY:
Characterization and Management of MSW Incineration Ash.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Trevor Bridle
Wastewater Technology Centre
Environment Canada
867 Lakeshore Rd., Burlington, Ontario
L7R 4A6 Telephone: (416) 336-4720

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

As above.

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IDENTIFYING NUMBER: 68348 STARTING DATE: 06/06/85 COMPLETION DATE: /04/88

GOAL/RATIONALE/SCOPE:

To characterize ashes from three MSW incinerators (modular, mass-burn, RDF) and to estimate the environmental availability of both the organic and inorganic contaminants in the ash. Where applicable, research will be conducted to develop appropriate ash management strategies. Research in solidification, vitrification and metal recovery are planned.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 20 K	$ 50 K	$ 50 K	$ 60 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
NITEP Phase II - Assessment of Ash Contaminant Leachability by S.E. Sawell, T.R. Bridle and T.N. Constable.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Waste Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:

Dioxin-emissions from municipal waste incinerators

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Landesanstalt für Immissionsschutz des Landes Nordrhein-Westfalen, Wallneystraße 6, D-4300 Essen
Tel.: 0201/79951

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Umweltbundesamt, Bismarckplatz 1, D-1000 Berlin 33

IDENTIFYING NUMBER: 1460429 **STARTING DATE:** 1/1/86 **COMPLETION DATE:** 30/6/87

GOAL/RATIONALE/SCOPE:

This project is part of a FRG-program to investigate PCDD/PCDF-formation and destruction in municipal waste incinerators.
This projects main objective: Investigation of the influence of grate and boiler construction, waste pre-treatment and sludge cofiring on PCDD/PCDF-formation.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1.000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ - K	$ 301.000 K	$ 150.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
	Sources	Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources		
			Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) xxAxx (B) xCx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Emissions of Dioxins at Waste Incineration Plants

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

G. Bröker, Landesanstalt für Immissionsschutz Nordrhein-Westfalen,
Wallneyerstr. 6, 4300 Essen

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Umweltbundesamt, Bismarckplatz 1, 1000 Berlin 33, (030) 8903-261 (Chr. Nels)

IDENTIFYING NUMBER: 146 0429/6 **STARTING DATE:** 1/3/86 **COMPLETION DATE:** 31/8/87

GOAL/RATIONALE/SCOPE:
Reduction of PCDD/PCDF emissions at waste incineration plants

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ K	$ 307 K	$ 307 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Italy

TITLE OF PROJECT OR ACTIVITY: Determination of PCDD, PCDF, IPA in he emission from the incinerators.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. Gino Camici, Servizio Multizonale di Prevenzione U.S.L. No2 Regione Toscana.
via del Patriota 2, 54100 Massa(MS) TEL 0585/40676

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Regione Toscana U.S.L. No2 via del Patriota No2, 54100 Massa (MS) 0585/40676

IDENTIFYING NUMBER: _____ STARTING DATE: 01/05/87 COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE: Assessment of environmental impact by a technologically advanced incinerators.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents) Control as provided by law. Publications, technical reports.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	(2378 TCDD)
		Effects	Pharmacological	(TCDD)
				(PCDD)
				(PCDF)
	Properties	Toxicity	Bioaccumulation	(Other Compounds)
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	(Emissions)	
	(Sources)	(Incineration)	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Canada FE 2

TITLE OF PROJECT OR ACTIVITY: SEWAGE Sludge Incinerator Emissions Testing

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

R. Christensen, Conservation & Protection, Environment Canada
Place Vincent Massey, 13th Floor
Ottawa, Ontario
K1A 0E7 Tel. 819 - 953-1113

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

IDENTIFYING NUMBER: 1333 STARTING DATE: /09/86 COMPLETION DATE: /10/86

GOAL/RATIONALE/SCOPE:

To determine concentrations of dioxins and selected organics and metals in the air, water and solid waste streams from a fluid bed sewage sludge incinerator.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 40 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical report on the results of the testing.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	2378 TCDD TCDD PCDD PCDF Other Compounds
	Analytical Methods			Standards QA/QC Methods Research
B	Sources	Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
			Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental		
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Italy

TITLE OF PROJECT OR ACTIVITY: Identification of Toxic Components in Stationary and Mobile Sources (PAH, Nitro-PAH, PCDDs and PCDFs)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Paolo Ciccioli, Istituto Sull' Inquinamento a Tmosferico Del Cnr Area Della Ricerca Di Roma,
Via Salaria km 29,300, C.P. 10, 00016, Monterotondo-Scalo - Italy

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Direzione Progetto Finalizzato
ENEA - Viale Regina Marguerita - Roma Italy
CNR - Piazzale Aldo Mora - 00100 - Roma Italy

IDENTIFYING NUMBER: A. I. 500 STARTING DATE: 10/05/85 COMPLETION DATE: 10/11/88

GOAL/RATIONALE/SCOPE: Asses the role of PAH, Nitro-PAH, PCDD and PCDFs on the health and environment.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 20 K	$ 30 K	$ 25 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Reports

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	(Monitoring) Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	(2378 TCDD TCDD PCDD PCDF Other Compounds) Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	(Sources)	Manufacturing Incineration Internal Combustion Engines End Products/Use (Other Sources)	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water (Air) Tissue Food Animal Human Environmental Manufacturing Products (Plant) Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: UNITED KINGDOM

TITLE OF PROJECT OR ACTIVITY:

DETERMINATION OF LEVELS OF PCDDs & PCDDs IN THE VICINITY OF VARIOUS TYPES OF INCINERATION PLANT.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr C Creaser University of East Anglia Norwich England
Tel 0603 56161 x 2009

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Department of the Environment, Hazardous Waste Inspectorate
Romney House, 43 Marsham Street, London SW1P 3PY ENGLAND
Project Officer E.A.Cox Tel London 212 6543

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IDENTIFYING NUMBER: _____ STARTING DATE: 01/05/87 COMPLETION DATE: 01/03/89.

GOAL/RATIONALE/SCOPE:

TO INVESTIGATE LOCAL PCDD & PCDF LEVELS IN SOILS IN THE VICINITY OF INCINERATION PLANT

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ — K	$ — K	$ 150 K	$ 200 K	$ 90 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

TECHNICAL REPORTS
LITERATURE PUBLICATIONS

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) [B] C **COUNTRY OF ORIGIN:** CANADA

TITLE OF PROJECT OR ACTIVITY: Development of Code of Good Practice
Canadian Wood Preservation Industry

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

1. G. Das EPS/IPB
   Place Vincent Massey
   Hull, Quebec K1A 1C8
   (819) 997-3713

2. K. Wile - EPS Pacific Region
   Kapilano 100 - Port Royal South
   West Vancouver, British Columbia V7T 1A2
   (604) 666-6711

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

EPS PVM, Ottawa, Ontario K1A 1C8

IDENTIFYING NUMBER: _____ **STARTING DATE:** 82/-/- **COMPLETION DATE:** 88/03/31

GOAL/RATIONALE/SCOPE:

Minimize possible dioxins into the environment from wood preservation plants.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 20 K	$ 34 K	$ 40 K	$ 40 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

1. Technical Recommendation documents.
2. Code of good practice.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** U. S.

TITLE OF PROJECT OR ACTIVITY:

Superfund Dioxin Site Activities

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Paul E. des Rosiers, Chairman, Dioxin Disposal Advisory Group, EPA (RD-681), Washington, DC 20460

Phone: (202) 382-2722

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

IDENTIFYING NUMBER: _____ **STARTING DATE:** continuing **COMPLETION DATE:** continuing

GOAL/RATIONALE/SCOPE:

The disposition of dioxin-contaminated waste and soils at Superfund sites within the U. S., subject the Dioxin-listing rule (U.S. Federal Register (1985), 50 (9), 1978-2006) and Land Disposal Restriction final rule (U.S. Federal Register (1986), 51 (216), 40572-40654).

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Dioxin Superfund Site Investigations/Activities (partial):
(1) Tibbetts Road, Barrington, NH; (2) Brady Metals, Newark, NJ; (3) Diamond Shamrock, Newark, NJ;
(4) Denney Farm, McDowell, MO; (5) Union Carbide, St. Joseph, MO; (6) Times Beach, MO;
(7) Vertac Chemical, Jacksonville, AR; (8) Montana Pole, Butte, MT; (9) Western Processing, Kent, WA;
(10) NCBC, Gulfport, MS; (11) Koppers, Oroville, CA;
(12) Hyde Park, Niagara Falls, NY; and
(13) Love Canal, Niagara Falls, NY.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation
	Analytical Methods	Sampling	Equivalency Chemicokinetics Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Waste Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Product Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Italy

TITLE OF PROJECT OR ACTIVITY: Occurance of PCDDs and PCDFs in PCBs used as Dielectric Fluids.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Alessandro Di Domenico - Istituto Superiore di Sanita -
Viale Regina Elena 299 - 00161 Roma (Italy)
PHONE (Italy-Rome) 4990/995

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

National Railway Service - Rome

IDENTIFYING NUMBER: _____ STARTING DATE: 6/01/87 COMPLETION DATE: 6/30/89

GOAL/RATIONALE/SCOPE: Assessment of PCDD and PCDF levels in exhausted dielectric fluids and in matrices hit by accident - released PCBs - Definition of detection techniques.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ 30 K	$ 30 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Reports and publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Italy

TITLE OF PROJECT OR ACTIVITY: Inactivation of Chlorinated Aromatic Compounds in Aqueous Media by Photochemical Techniques

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Alessandro Di Domenico
(SEE BELOW)

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Istituto Superiore Di Sanita'
Viale Regina Elena 299
00161 Roma - Italy (Italy-Rome-) 4990
Ex. 995

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IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /
IN PROGRESS

GOAL/RATIONALE/SCOPE: To develop photochemical methods of inactivation for selected halogenated compounds, and study the kinetics of inactivation- to indicate the engineering feasibility of such inactivation technique.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

No specific funds available aside from the Institute's support

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

-Tehcnical Reports
-Papers

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) xxxx(B)xxxx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
New Processes and Methods of Remedial Measures at Abandoned Sites Demonstrated at the Landfill Georgswerder

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
J. Ehresmann, Gesellschaft zur Beseitigung von Sonderabfällen, Gerolsheimerstr., 6710 Frankenthal

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Umweltbundesamt, Bismarckplatz 1, 1000 Berlin 33, (030) 8903-261, (Ch. Nels)

IDENTIFYING NUMBER: 144 04 19 F/O **STARTING DATE:** 1/1/86 **COMPLETION DATE:** 30/11/88

GOAL/RATIONALE/SCOPE:
Spreading of PCDD/PCDF within the landfill, remedial measures of dioxin-contaminated landfills

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ 201 K	$ 201 K	$ 212 K	$ 236 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical reports

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemiokinetics	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) xxxx (B) xxx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
New Processes and Methods for Remedial Measures of Abandoned Sites Demonstrated at the Landfill Gerolsheim

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
J. Ehresmann, Gesellschaft zur Beseitigung von Sonderabfällen, Gerolsheimerstr., 6710 Frankenthal, (06233) 79 78

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Umweltbundesamt, Bismarckplatz 1, 1000 Berlin 31, (030) 8903-261, (Ch. Nels)

IDENTIFYING NUMBER: 144 04 18 E/7 **STARTING DATE:** 1/1/86 **COMPLETION DATE:** 30/11/87

GOAL/RATIONALE/SCOPE:
Recording and decontamination of dioxin-contaminated leachate

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1988
FUNDING	$ K	$ 177 K	$ 221 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** United States

TITLE OF PROJECT OR ACTIVITY:
EPA Mobile Incinerator

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
U.S. Environmental Protection Agency
Region VII
726 Minnesota Avenue
Kansas City, KS 66101
(913) 236-2800

IDENTIFYING NUMBER: Unknown **STARTING DATE:** / / **COMPLETION DATE:** / /
(Obtain from Region VII)

GOAL/RATIONALE/SCOPE:
Contact Region VII for the rest of the information.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Enhanced photodehalogenation of haloaromatic pollutants

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Gary A. Epling 203-486-3215
Department of Chemistry
University of Connecticut
Storrs, CT 06268

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Edward Gardner, Jr. 919-541-7724
National Institute of Environmental Health Sciences

IDENTIFYING NUMBER: 5R01 ES03527-02 STARTING DATE: 12/1/84 COMPLETION DATE: 11/30/87

GOAL/RATIONALE/SCOPE:

To establish the general utility of a new method to degrade halogenated aromatic compounds including PCDDs, and to optimize the reaction conditions. The new technique relies on a photochemical dehalogenation, performed in the presence of hydride donors.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 76K	$ 71K	$ 70K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Publications, technical reports

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) Ax (B) xCxx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Study of Halogenated Dibenzodioxins (PCDD) and Dibenzofuranes (PCDF) Emissions from Internal Combustion Engines With Commercial Power Fuels (Part A)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Prof. Dr. U. Essers, Institut für Verbrennungsmotoren und Kraftfahrwesen der Universität Stuttgart, Pfaffenwaldring 12, 7000 Stuttgart 80, (0711)68556-00

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Gesellschaft für Strahlen- und Umweltforschung mbH München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089)3187-3372 (Dr. Ende)

IDENTIFYING NUMBER: 07 VDX 7A **STARTING DATE:** 01/07/87 **COMPLETION DATE:** 30/06/89

GOAL/RATIONALE/SCOPE:

Diesel and otto engines may emit PCDD/PCDF. Extensive studies, including the development of a sampling system, shall clarify the importance of this PCDD/PCDF source; analysis of chlorinated/brominated dioxins and furanes

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 40 K	$ 95 K	$ 32 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

reports, publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: COMMISSION OF THE EUROPEAN COMMUNITIES (ITALY)

TITLE OF PROJECT OR ACTIVITY: CHEMICAL WASTE

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

FACCHETTI Sergio, COMMISSION OF THE EUROPEAN COMMUNITIES, JOINT RESEARCH CENTER
RADIOCHEMISTRY DIVISION - 21027 ISPRA (Varese) ITALY
Telef. N. 0332/789970-789969

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Facchetti Sergio

IDENTIFYING NUMBER: _____ STARTING DATE: 1/1/86 COMPLETION DATE: 12/31/91

GOAL/RATIONALE/SCOPE:

Environmental impact assessment of toxic chemical wastes
Development of a decision support system for the management of toxic wastes

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ --- K	$ 200 K	$ 200 K	$ 200 K	$ 200 K

personnel costs not included

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

AN EXPERT SYSTEM FOR THE MANAGEMENT OF CHEMICAL ACCIDENTS INVOLVING HALOGENATED AROMATIC COMPOUNDS.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
(A)	Assessment	* Environmental Exposure Body Burden Risk Effects	(Monitoring) (Pathways) Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Physiologic Genetic (2378 TCDD) (TCDD) (PCDD) (PCDF) (Other Compounds)
	Analytical Methods		(Standards) (QA/QC) (Methods Research)
(B)	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	(Wastes) Sludge (Soil) (Sediment) (Water) Air (Tissue) Food Animal (Human) (Environmental) Manufacturing Products Plant (Cell Cultures)
	(Waste Management)	Interim Storage * (Exposure Control)	
(C)	Response	* Emergency Remedial Contingency Planning	(Decontamination) (Containment) Health/Safety (Surveillance/Monitoring)

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Italy

TITLE OF PROJECT OR ACTIVITY: Environmental Impact of Municipal Waste Incinerators Emissions

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Roberto Fanelli
Istituto Di Ricerche Farmacologiche
"Mario Negri" - Via Eritrea 62 - 20157 Milano

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Prof. G. Chiesa - Consiglio Nazionale Delle Ricerche
Progetto Finalizzato Energetica - Sottoprogetto Biomasse
Agricoltura - Pl. Morandi 2 20121 Milano

IDENTIFYING NUMBER: 8601025-59 STARTING DATE: 1/01/88 COMPLETION DATE: 12/31/

GOAL/RATIONALE/SCOPE: To assess the importance of technological or operative parameters of municipal waste incinerators for PCDD ro PCDF emissions.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ 80,000 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

-Technical reports, Scientific Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	(Monitoring) Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD (PCDD) (PCDF)
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds
	Analytical Methods			Standards QA/QC (Methods Research)
B	(Sources)	(Manufacturing) (Incineration) Internal Combustion Engines End Products/Use Other Sources	(Emissions) (Control Technology)	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human (Environmental) Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY: Removal of dioxins from industrial waste water by sorption

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

H. Scott Fogler
University of Michigan
3030 Dow Building
Ann Arbor, MI 48109-0135

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

D. Carey (202) 382-7445
US EPA
Office of Exploratory Research

IDENTIFYING NUMBER R81-2555-01 **STARTING DATE:** 3 / 1 / 86 **COMPLETION DATE:** 6 / 30 / 88

GOAL/RATIONALE/SCOPE:

To remove trace levels of toxic organic contaminants from industrial waste water. Cross-linked clays with zeolite-like micro structures and high surface areas will be synthesized and tested.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 102K	$ 103K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Testing and Development ov Various Solidification Technologies for PCDD/PCDF Contaminated Liquid and Liquid/Soil Waste Materials from Codisposed Household and Industrial Wastes in the Landfill Hamburg/Georgsverder

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Förstner, TU-Hamburg, Eißendorferstr. 38, D-2100 Hamburg 90, Tel.: 040/771702609;
Dr. Zarth, Baubehörde, WSF, Bleichenbrücke 17, D-2000 Hamburg 36, Tel.: 040/349132738
(to be contacted for further information)

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Dr. Nels, Umweltbundesamt, Bismarckplatz 1, D-1000 Berlin 33, Tel.: 030/8903-267;
Dr. Zarth, Baubehörde, WSF, Bleichenbrücke 17, D-2000 Hamburg 36, Tel.: 040/349132738

IDENTIFYING NUMBER: 1440388 D4 **STARTING DATE:** 1/7/85 **COMPLETION DATE:** 1/7/88

GOAL/RATIONALE/SCOPE:
Testing of various known solidification technologies with respect to immobilisation to toxic organic compounds including PCDDs/PCDFs and with respect to waterimpermeability of the solidification product. Improving these technologies by using special additives.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 200.000 K	$ 200.000 K	$ 200.000 K	$ _ K	$ _ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Research reports each year

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Biological Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) xA (B) xCx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Study of Halogenated Dibenzodioxins (PCDD) and Dibenzofuranes (PCDF) Emissions from Internal Combustion Engines With Commercial Power Fuels (Part C)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Dr. H. Hagenmaier, Institut für Organische Chemie der Universität Tübingen, Auf der Morgenstelle 18, 7400 Tübingen, (07071)29-2099

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Gesellschaft für Strahlen- und Umweltforschung mbH München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089)3187-3372 (Dr. Ende)

IDENTIFYING NUMBER: 07 VDX 7C **STARTING DATE:** 01 / 07 / 87 **COMPLETION DATE:** 30 / 06 / 89

GOAL/RATIONALE/SCOPE:
Diesel and otto engines may emit PCDD/PCDF. Extensive studies, including the development of a sampling system, shall clarify the importance of this PCDD/PCDF source; analysis of chlorinated/brominated dioxins and furanes

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 43 K	$ 126 K	$ 43 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
reports, publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Determination of PCDD/PCDF and other Chlorinated Hydrocarbons in Sewage Sludge

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. H. Hagenmaier, Auf der Morgenstelle 18, D-7400 Tübingen, Tel.: 07071/292099

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Umweltbundesamt, Bismarckplatz 1, D-1000 Berlin 33, Tel.: 030/8903-592

IDENTIFYING NUMBER: 103 03 305 **STARTING DATE:** 1/11/85 **COMPLETION DATE:** 1/8/86

GOAL/RATIONALE/SCOPE:

To determine the PCDD/PCDF levels in Sewage Sludge of Several Sewage treatment plants in West-Germany

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ - K	$ 90.000 K	$ - K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY: NATIONAL INCINERATOR TESTING AND EVALUATION PROGRAM (NITEP)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

D.J. HAY
ENVIRONMENT CANADA
OTTAWA, ONTARIO, CANADA
K1A 0E7

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

AS ABOVE.

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

Define the characteristics for MSW incineration in relation to their emissions and development recommendations for technical and regulatory control.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 2800 K	$ 3600 K	$ 3100 K	$ 3100 K	$ 3000 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Prince Edward Island (PEI) test report series (5 vol.) EPS 3/UP/1
Gas Cleaning System (Flakt) test report series (6 vol.) EPS 3/UP/2
Mass Burn test (Que. City) report series (7 vol.)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
SURVEY OF ORGANIC COMPOUNDS, INCLUDING CDDs/CDFs, IN ONTARIO SEWAGE TREATMENT PLANT EFFLUENTS

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Mr. A. Ho (416-323-4980)
Ontario Ministry of Environment
Water Resources Branch
1 St. Clair Ave. W., 7th Floor
Toronto, Ontario, CANADA M4V 1K6

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Dr. R.E. Clement (416-235-5896)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213, (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: _____ STARTING DATE: 01/11/86 COMPLETION DATE: 31/12/87

GOAL/RATIONALE/SCOPE:
Complete chemical analysis of effluents from 40 Ontario sewage treatment plants, including volatile organics, pesticides, PAH and dioxins/furans.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 700 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Reports, Journal Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

orking Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation	
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:

Combustion experiments for the minimization of PCDD/PCDF-emissions

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Deutsche Babcock Anlagen AG, Parkstraße 29, D-4150 Krefeld 11, Tel.: 02151/448544

Horch

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Umweltbundesamt, Bismarckplatz 1, D-1000 Berlin 33, Tel.: 030/8903-421

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IDENTIFYING NUMBER: 1450432 **STARTING DATE:** 1 / 1 / 86 **COMPLETION DATE:** 31 / 12 / 87

GOAL/RATIONALE/SCOPE:

Investigation of the influence of combustion conditions, waste constitutents, chlorine donoers and CaO addition on PCDD/PCDF-formation at a 0,5 t/h fluidized bed reactor. The project is part of a joint undertaking of the Deutsche Babcock Anlagen AG (DBA) and the University of Bayreuth. DBA is dealing with the technical aspects of the project, whereas the University of Bayreuth is responsible for the dioxin analytics.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ - K	$ 161.000 K	$ 161.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
	Destruction	Incineration	Soil	Human
		Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
PCDD/PCDF-Analysis of Municipal and Special Incinerators

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Dr. O. Hutzinger; Chair of Ecological Chemistry and Geochemistry University of Bayreuth, Postfach 30 08, D-8580 Bayreuth, Tel.: 0921/552254

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

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IDENTIFYING NUMBER: _____ **STARTING DATE:** 1/9/84 **COMPLETION DATE:** / / unknown

GOAL/RATIONALE/SCOPE:
PCDD/PCDF-analysis of fly ash, slag and exhaust gas of municipal and special incinerators.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 160.000 K	$ - K	$ - K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

The results are delivered to the Bavarian Environmental Ministry. These data will be published by this department.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
	Destruction	Incineration	Soil	Human
		Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) ~~I~~ (II) ~~III~~ ~~IV~~ **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Study of the Possible Release of Brominated/Chlorianted Dioxins and Furanes

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Dr. O. Hutzinger, Lehrstuhl für Ökologische Chemie und Geochemie der Universität Bayreuth, Universitätsstraße 30, 8580 Bayreuth, (0921)552-254

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Gesellschaft für Strahlen- und Umweltforschung mbH München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089)3187-3372 (Dr. Ende)

IDENTIFYING NUMBER: 07 64 005 **STARTING DATE:** 01/04/87 **COMPLETION DATE:** 31/03/89

GOAL/RATIONALE/SCOPE: Plastics are treated with flame retardents that generate brominated dioxins and furanes during pyrolysis. In waste incineration plants there may be exchange of the brome by chlorine atoms in the presence of PVC. The analytics of these mixed halogenated dioxins and furanes shall be developed.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 126 K	$ 126 K	$ 53 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

reports, publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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Figure 1

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) ~~A~~ (B) ~~C~~ **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Study of Halogenated Dibenzodioxins (PCDD) and Dibenzofuranes (PCDF) Emissions from Internal Combustion Engines With Commercial Power Fuels (Part B)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Dr. Hutzinger, Lehrstuhl für Ökologische Chemie und Geochemie der Universität Bayreuth, Universitätsstraße 30, 8580 Bayreuth, (0921)552-254

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Gesellschaft für Strahlen- und Umweltforschung mbH München, Ingolstädter Landstraße 1, 8042 Neuherberg, (089)3187-3372 (Dr. Ende)

IDENTIFYING NUMBER: 07VDX7B **STARTING DATE:** 01/07/87 **COMPLETION DATE:** 30/06/89

GOAL/RATIONALE/SCOPE:
Diesel and otto engines may emit PCDD/PCDF. Extensive studies, including the development of a sampling system, shall clarify the importance of this PCDD/PCDF source; analysis of chlorinated/brominated dioxins and furanes

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 49 K	$ 95 K	$ 47 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

reports, publications

KEY WORDS: (circle appropriate key words on reverse side)

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Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Syntheses	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources		
			Wastes	Food
			Sludge	Animal
			Soil	Human
			Sediment	Environmental
	Destruction	Incineration	Water	Manufacturing Products
		Detoxification	Air	Plant
		Physicochemical	Tissue	Cell Cultures
		Biological		
		Environmental		
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:

Comparative Studies on the Exposition of Polychlorinated Dibenzodioxine and Polychlorinated Dibenzofurans from Industrial Processes

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Prof. Dr. O. Hutzinger, Lehrstuhl für Ökologische Chemie und Geochemie der Universität Bayreuth, Tel.: 0921/55-2252

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Umweltbundesamt, Bismarckplatz 1, D-1000 Berlin 33

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IDENTIFYING NUMBER: 106 05 057 **STARTING DATE:** 1/11/85 **COMPLETION DATE:** 15/3/88

GOAL/RATIONALE/SCOPE:

Data collection and report on information of Dioxin related compounds.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 17.000 K	$ 77.000 K	$ 77.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Compiling and evaluating of all the literature reports on Dioxins and Dibenzofurans are in progress

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

Physiologic
Genetic

2378 TCDD
TCDD
PCDD
PCDF
Other Compounds

Standards
QA/QC
Methods Research

Wastes
Sludge
Soil
Sediment
Water
Air
Tissue

Food
Animal
Human
Environmental
Manufacturing Products
Plant
Cell Cultures

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:

"Search for PCDD/PCDFs in processes or organic chlorine chemistry"

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Prof. Dr. O. Hutzinger; Chair of Ecological Chemistry and Geochemistry, University of Bayreuth,
Postbox 30 08, D-8580 Bayreuth, Tel.: 0921/552252
(contact for further information)

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Umweltbundesamt, Bismarckplatz 1, D-1000 Berlin 33

IDENTIFYING NUMBER: 103 03 518 **STARTING DATE:** 1/7/84 **COMPLETION DATE:** 30/6/86

GOAL/RATIONALE/SCOPE:

Search for industrial PCDD/PCDF-sources and their avoidance; analysis of industrial technical products and in laboratory prepared residues for PCDD/PCDF's; experiments to elucidate the mechanism of PCDD/PCDF-formation

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 85.000K	$ 30.000 K	$ - K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources		
			Wastes	Food
		Incineration	Sludge	Animal
		Detoxification	Soil	Human
		Physicochemical	Sediment	Environmental
	Destruction	Biological	Water	Manufacturing Products
		Environmental	Air	Plant
			Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) ~~A~~ (B) ~~C~~ ~~D~~ **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Study of possible Release of Poly-Brominated Dioxins and Furanes from Fire-Protected Plastics during Fire

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. O. Hutzinger, Universität Bayreuth, Ökologische Chemie, 8580 Bayreuth, (0721) 55 22 54

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Umweltbundesamt, Bismarckplatz 1, 1000 Berlin 33, (030) 8903-1 (Dr. H. Pohle)

IDENTIFYING NUMBER: 104 03 362 **STARTING DATE:** 1/11/86 **COMPLETION DATE:** 31/10/88

GOAL/RATIONALE/SCOPE:
Determination of the poly-brominated dioxins/furanes which are released during the pyrolysis of fire-protected plastics

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ - K	$ 30 K	$ 118 K	$ 83 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
Sorption/Desorption of 2,3,7,8-TCDD in Contaminated Soils

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. Danny R. Jackson
Radian Corporation
P.O. Box 9948
Austin, Texas 78766 USA
Telephone: 512/454-4797

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

U.S. Environmental Protection Agency
Hazardous Waste Engineering Research Laboratory
26 West St. Clair Street
Cincinnati, OH 45268 USA

Project Officer: Dr. Michael H. Roulier
Telephone: 513/569-7796

IDENTIFYING NUMBER: MERL Task C2.09 STARTING DATE: 5/9/84 COMPLETION DATE: 12/15/84

GOAL/RATIONALE/SCOPE:
Collect soil samples from locations in Missouri and New Jersey that had been contaminated with 2,3,7,8-TCDD. Conduct laboratory leaching studies to determine whether 2,3,7,8-TCDD could move in water percolating through these soils and identify soil properties that control the rate of movement. In particular, examine the relative importance of native soil organic matter and man-made organic compounds in affecting movement of 2,3,7,8-TCDD in soil.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ - K	$ - K	$ - K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

- o Jackson, D.R., M.H. Roulier, H.M. Grotta, S.W. Rust, and J.S. Warner (1986). Solubility of 2,3,7,8-TCDD in Contaminated Soils. Chapter 13 In: Chlorinated Dioxins and Dibenzofurans in Perspective. Lewis Publishers, Inc., Chelsea, MI 48118 USA, 185-200.
- o Jackson, D.R., M.H. Roulier, H.M. Grotta, S.W. Rust, and J.S. Warner, M.F. Arthur, and F.L. DeRoos (1985). Leaching Potential of 2,3,7,8-TCDD in Contaminated Soils. In: Land Disposal of Hazardous Waste, (EPA/600/9-85/013) USEPA, Cincinnati, OH 45268 USA, 153-168.

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Effects of Other Non-Polar Organics on Movement of Dioxins and Furans in Soils

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Danny R. Jackson
Radian Corporation
P.O. Box 9948
Austin, Texas 78766 USA
Telephone: 512/454-4797

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

U.S. Environmental Protection Agency
Hazardous Waste Engineering Research Laboratory
26 West St. Clair Street
Cincinnati, OH 45268 USA

Project Officer: Dr. Michael H. Roulier
Telephone: 513/569-7796

IDENTIFYING NUMBER: HWERL WP# 85298Y STARTING DATE: 2/15/86 COMPLETION DATE: 4/15/88

GOAL/RATIONALE/SCOPE:

Examine the partitioning of dioxins and furans between liquids and solids and potential mobility in oil-contaminated soils from pentachlorophenol-process wood treating facilities. Determine why models predict low mobility even though extensive migration in soils and groundwater has been observed. Evaluate the ability of laboratory leaching tests and models to provide data useful for site-specific assessments of dioxin and furan mobility in oily soils.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 80 K	$ 35 K	$ 232 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Soil samples from two locations collected and characterized. Subsequent laboratory leaching studies will begin 05/87. Final project report will be available 05/88.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	
	Analytical Methods	Sampling		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY:
Times Beach Research Facility

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
A consurtium of the following: Agro-K Corporation (81 St. Anthony Blvd., Minneapolis, MN 55418, phone: 612-781-3867), J.M. Huber Corporation (5766 Benford Drive, Haymaker, VA 22069, phone: 703-754-4441), Monsanto Corporation - FZWJ (800 N. Lindbergh, St. Louis, MO 63167, phone: 314694-6174), PPM, Inc. (10 Central Avenue, Kansas City,MO 66118, phone 913-621-4206), Shirco Infrared Systems, Inc. (1195 Empire Central, Dallas, TX 75247, phone: 214-630-7511) and the Environmental Trace Substances Research Center (University of Missouri, Route 3, Columbia, MO 65201 phone 314-882-2151)

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)
Linda E. James, Dioxin Coordinator
Missouri Department of Natural Resouces
P.O. Box 176
Jefferson City, MO 65102
(314) 751-4758

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IDENTIFYING NUMBER: N/A STARTING DATE: 7 / /84 COMPLETION DATE: ongoing / /

GOAL/RATIONALE/SCOPE: To provide a facility to field test methods for destroying dioxin.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 200K	$ 5 K	$ 5 K	$ 5 K	$ 5 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
This information should be requested from the companies and university.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental (all are included)	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) xxxx (B) xxxx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Environment-Related Study of Pollutants in Pyrolysis Oil with a Comparison to Other, Technical Used Oils

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. D.W. Kaminsky, Institut für Technische und Makromolekulare Chemie, Universität Hamburg, 2000 Hamburg 13

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Deutsche Forschungs- und Versuchsanstalt für Luft- und Raumfahrt, 5300 Bonn 2, (0228) 3821-200, (Dr. Hansen)

IDENTIFYING NUMBER: 0214 8504/7 **STARTING DATE:** 1/4/86 **COMPLETION DATE:** 30/6/87

GOAL/RATIONALE/SCOPE:
Pyrolysis oil from shredder waste shall be examined for its contents of PCDD/PCDF

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ K	$ 59 K	$ 50 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY: Study of the thermal reactions of polychlorinated Dibenzo-p-Dioxins on flyash particles under incinerator conditions.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Prof. F.W. Karasek (519-885-1211 Ext. 3423
Department of Chemistry
University of Waterloo
Waterloo, Ontario, CANADA N2L 3G1

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Dr. R.E. Clement (416-235-5896)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Re sources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: RAC Grant 246 RR STARTING DATE: 17/04/86 COMPLETION DATE: 31/08/87

GOAL/RATIONALE/SCOPE:

To study the formation of CDDs/CDFs under various conditions of incineration to elucidate formation mechanisms and minimize formation.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 22 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report, Journal Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY: RECOVERY OF SINKING CHEMICALS FROM THE BOTTOM OF A BODY OF WATER WITH SORBENTS

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

F. LAPERRIERE (613) 998-9622
RIVER ROAD ENVIRONMENTAL TECHNOLOGY CENTRE
OTTAWA, ONTARIO. CANADA
K1A 0ET

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

NIL

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IDENTIFYING NUMBER: _____ STARTING DATE: 04/01/87 COMPLETION DATE: 31/08/87

GOAL/RATIONALE/SCOPE:

A LABORATORY SCALE INVESTIGATION INTO THE USE OF SORBENTS TO RECOVER CHEMICALS FROM THE BOTTOM OF RIVERS AND LAKES IS UNDERWAY. THIS TECHNIQUE IS APPLICABLE TO HEAVY IMMISCIBLE LIQUIDS SUCH AS PCB'S WHICH ARE OFTEN CONTAMINATED WITH FURANS AND DIOXINS.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ -- K	$ -- K	$ 10 K	$ -- K	$ -- K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

A TECHNICAL REPORT WILL BE PUBLISHED. FOLLOW-ON WORK WITH USEPA IS UNDER CONSIDERATION.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:

Treatment of halogenated organic liquids from refuse tips (separation and treatment of Dioxins)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Technische Universität München, Am Coulombwall, D-8046 Garching, Tel.: 089/32093700, Dr. Leonhard

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Umweltbundesamt, Bismarckplatz 1, D-1000 Berlin 33, Tel.: 030/8903-1

IDENTIFYING NUMBER: 103 02 224 **STARTING DATE:** 1 /11 /84 **COMPLETION DATE:** 31 /12 /86

GOAL/RATIONALE/SCOPE:

Evaluation of a chemical physical process for the treatment of Dioxins in hazardous liquid wastes from refuse tips (extraction, vaporization, thermal destruction)

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$130.000 K	$ 100.000 K	$ - K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

First Report to the Umweltbundesamt

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources		
		Incineration	Wastes	Food
		Detoxification	Sludge	Animal
	Destruction	Physicochemical	Soil	Human
		Biological	Sediment	Environmental
		Environmental	Water	Manufacturing Products
			Air	Plant
			Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Formation of PCDD and PCDF in municipal incinerators

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

prof. dr. R. Louw, Projectgroep Chemie en Milieu,
State University Leiden, P.O. Box 9502, 2300 RA LEIDEN
tel. (71) 274289

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Ministry of Housing, Physical Planning and Environment, P.O. Box 450, 2260 MB LEIDSCHENDAM
dr. J.A. van Zorge
tel. (70) 209367 ext. 2840

IDENTIFYING NUMBER: _____ **STARTING DATE:** 01 /06 /87 **COMPLETION DATE:** 01 /06 /89

GOAL/RATIONALE/SCOPE: Study on the mechanism of formation of PCDD and PCDF in municipal incinerators and on possibilities to inhibit this formation

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 40 K	$ 70 K	$ 30 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical reports and publications in scientific journals

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				(PCDD)
				(PCDF)
	Properties	Toxicity	Bioaccumulation	(Other Compounds)
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	(Sources)	Manufacturing	(Emissions)	
		(Incineration)	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	(Wastes)	Food
			Sludge	Animal
		Incineration	Soil	Human
	Destruction	Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) xxx (B) xxxx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Development of a Comprehensive Concept for an Environment Neutral Treatment and Purification of Dioxin-Contaminated Leachates Demonstrated at the Landfill Malsch

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

K. Mangold, Gesellschaft zur Beseitigung von Sonderabfällen, Gerolsheimerstr., 6710 Frankenthal

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Umweltbundesamt, Bismarckplatz 1, 1000 Berlin 33, (030) 8903-261, (Ch. Nels)

IDENTIFYING NUMBER: 145 03 82 I/8 **STARTING DATE:** 1 / 12 / 85 **COMPLETION DATE:** 30 / 11 / 88

GOAL/RATIONALE/SCOPE:

Purification of dioxin-contaminated leachates

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1988
FUNDING	$ 37 K	$ 590 K	$ 590 K	$ 590 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: [bracket one] A [B] C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: Investigation of Potential Sources of Dioxin in Pulp and Paper Mills

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Alec McBride
USEPA, WH-553
401 M Street SW.
Washington, DC 20460
(202-382-7046)

Gary Amendola
USEPA
25089 Center Ridge Road
Westlake, OH 44145
(216-835-5200)

NAME, ADDRESS, AND TELEPHONE NUMBER OF SUPPORTING AGENCY (include name of Project Officer):

(See above)

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IDENTIFYING NUMBER: _____ STARTING DATE: March 1986 COMPLETION DATE: October 1987

GOAL/RATIONALE/SCOPE: A joint study with the paper industry to identify potential sources and emissions of dioxins from pulp and paper mills. The study was initiated after findings of dioxins in fish downstream from paper mills and, subsequently, in the waste treatment sludges from the mills.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 200 K	$ 200 K	$ K	$ K

MAJOR OUTPUTS (e.g., technical reports, other publications, patents):

Technical Report

KEY WORDS [bracket appropriate key words on reverse side]:

KEY WORDS [BRACKET APPROPRIATE KEY WORDS]

Working Group	Select one only	Select one	Select all that apply
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Analytical Methods		
B	[Sources]	[Manufacturing] Incineration Internal Combustion Engines End Products/Use Other Sources	[Emissions] Control Technology [Wastes] [Sludge] Soil Sediment [Water] Air [Tissue] [Food (fish)] Animal Human [Environmental] [Manufacturing Products] Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: DENMARK

TITLE OF PROJECT OR ACTIVITY:
Danish Incinerator testing programme

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Miljøstyrelsen(Danish Environmental Protection Agency)

Strandgade 29, 1401 Copenhagen.

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Miljøstyrelsen, See above.

IDENTIFYING NUMBER: _____ STARTING DATE: 1/5/86 COMPLETION DATE: 1/?/8
ongoing

GOAL/RATIONALE/SCOPE:

Method development and determination of total emission of PCDD and PCDF from Danish municipal solid waste incinerators.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0 K	$ 0 K	$ ~500 K	$ ~500 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Reports.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
	Sources	Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** DENMARK

TITLE OF PROJECT OR ACTIVITY:

Pilot emission tests at the Amager incinerator Plant in Copenhagen.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Miljostyrelsen(Danish EPA), Strandgade 29, 1401, Copenhagen and

Technological Institute, Chem. Dept., DK-2630 Taastrup, Denmark.

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Miljostyrelsen, See above.

IDENTIFYING NUMBER: _____ **STARTING DATE:** 1/1/85 **COMPLETION DATE:** 1/6 86

GOAL/RATIONALE/SCOPE:

Method development and determination of emission of PCDD and PCDFs.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ ~60 K	$ ~30 K	$ 0 K	$ 0 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical report and Guideline on MSW incineration in Denmark.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC Methods Research
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental		
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:

Trial Burn and Field Operation of the USEPA Mobile Incineration System on Dioxin-Contaminated Liquids and Solids

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Helge Mortensen
Enviresponse, Inc.
110 South Orange Avenue
Livingston, NJ 07039
201/533-3791

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Frank J. Freestone, Chief
Technology Evaluation Staff
Releases Control Branch, LPCD
Hazardous Waste Engineering Research Laboratory
GSA-Raritan Depot, Bldg. 10
Edison, New Jersey 08837-3679
201/321-6632 or FTS 340-6632

IDENTIFYING NUMBER: EPA Contract No. 68-03-3255 STARTING DATE: 3/1/84 COMPLETION DATE: 12/31/87

GOAL/RATIONALE/SCOPE:

The primary objectives of the Missouri Trial Burn and Field Demonstration are: 1) verify that various types of dioxin-contaminated Missouri soils and other types of dioxin-contaminatted solids can be decontaminated via incineration to less than 1 ppb of 2,3,7,8-TCDD; 2) establish an operating factor for long-term, production-mode operation of the MIS; 3) dispose of dioxin-contaminated materials at the Denney Farm and other southwestern Missouri locations.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 987 K	$ 2774 K	$ 4300 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

o F. Freestone, R. Hazel, I. Wilder, J. Brugger, J. Yezzi, R. Miller, C. Pfrommer, R. Helsel, and E. Alperin (1986). Evaluation of On-site Incineration for Cleanup of Dioxin-Contaminated Materials. EPA Technical Report

o des Rosiers, P.E. (1987). Evaluation of Technology for Wastes and Soils Contaminated with Dioxins, Furans, and Related Substances. Jour. Haz. Mat., 14, 119-133.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Standards QA/QC Methods Research
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
INVESTIGATE EMISSIONS OF CDDs/CDFs AND OTHER ORGANICS FROM MEDICAL WASTE INCINERATORS

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
V. Ozvacic (416-96505776)
Ontario Ministry of Environment
Air Resources Branch
880 Bay St., 4th Floor
Toronto, Ontario, CANADA M5S 1Z8

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Dr. R.E. Clement (416-235-5896)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: _____ STARTING DATE: 01/05/87 COMPLETION DATE: 30/03/88

GOAL/RATIONALE/SCOPE:
To assess the emissions of CDD/CDF and related compounds from medical waste incinerators and to generate emission data needed for guideline development.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 250 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report, Journal Publication

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: ITALY

TITLE OF PROJECT OR ACTIVITY: Photocatalytic Degradation of Chloroaromatic Compounds

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Ezio PELIZZETTI
Dip. Chimica Analitica
Univ. di Torino
Via Giuria, 5 10125 Torino, Italy

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Partial support from Italian CNR, MPI , Rome

IDENTIFYING NUMBER: _____ STARTING DATE: 1/1/84 COMPLETION DATE: 31/12/90

GOAL/RATIONALE/SCOPE:

Photocatalysts based on semiconductor materials are able to degrade haloaromatic compounds under solar light. Complete mineralization into CO_2 and HCl could be achieved.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 10 ~~7~~K	$ 15 ~~10~~K	$ 20 ~~12~~ K	$ 25 ~~7~~ K	$ 30 ~~7~~ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

E.Pelizzetti et al., Nouv. J. Chim., 1984, 8, 547
E.Pelizzetti et al., Chemosphere, 1985, 14, 195
E.Pelizzetti et al., Chim.ind., 1985, 67, 623

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation Equivalency	Other Compounds Standards
	Analytical Methods	Biological Sampling	Chemicokinetics	QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Italy

TITLE OF PROJECT OR ACTIVITY: "The Combustion of Municipal Wastes and PCDDs and PCDFs Emissions". Project "Progetto Finalizzato Energetica 2, CNR"

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Demetrio Pitea, Dipartmento di Chimica Fisica ed Electtrochimica, Universita degli Studi di Milano, Via Golgi 19, 20133, Milano Italy. PHONE 02/2365533 - 2367008

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Consiglio Nazionale delle Ricerche, Progetto Finalizzato Energetica 2, P.le A.Moro, 10
00185 ROMA (Italy)

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE: To study the relations between MSW incineration and the presence of PCDDs and PCDFs in emissions from MSW incinerators.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 60.000 K	$ 70.000 K	$ 250.000 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
Publications, Technical reports

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation	Other Compounds
	Analytical Methods	Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue	 Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental		
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY:
Chemical Decontamination of Chlorinated Dioxins and Related Compounds in Contaminated Liquids and Solids

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Charles J. Rogers
U.S. Environmental Protection Agency
26 West St. Clair Street
Cincinnati, Ohio 45268 USA

Robert Peterson
Galson Research Corporation
6601 Kirkville Road
E. Syracuse, New York 13057 USA

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

IDENTIFYING NUMBER: EPA Contract No. 68-03-3210 STARTING DATE: 9 / 1 /84 COMPLETION DATE: 12 / 30 /90

GOAL/RATIONALE/SCOPE:
To develop and evaluate chemical methods for the destruction of dioxins and chemically related compounds. Although often present in small amounts, the nature of the environmental dangers caused by dioxins and related compounds require special treatment not afforded by more traditional methods. Field studies have been initiated using innovative techniques to demonstrate the destruction of dioxins in soils and in contained waste, such as PCBs, PCP, EDB, halogenated solvents, etc.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 100 K	$ 270 K	$ 400 K	$ 500 K	$ 500 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

- Technical report(s) on treatment of dioxin contaminated liquids (1987), soils (1988) and liquids (1989).
- desRosiers, P.E. (1986). APEG Treatment of Dioxin- and Furan-Contaminated Oil at an Inactive Wood Treating Site in Butte, Montana. Paper presented at the Panel on New and Emerging Technology, Annual Meeting of the American Wood Preservers Institute, Washington, DC, October 18.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics 2378 TCDD TCDD PCDD PCDF Other Compounds
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:

Destruction Technologies

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. R. Roth, Gesellschaft für Dekontamination mbH, DEKONTA GmbH, Lotharstr. 26, D-6500 Mainz,
Tel.: 06131/232148

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

IDENTIFYING NUMBER: III + IV **STARTING DATE:** 1/1 85 **COMPLETION DATE:** open / /

GOAL/RATIONALE/SCOPE:

Development of physical, chemical and biological destruction technologies for contaminated soil, water and organic liquids

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 1000 K	$ 2000 K	$ open K	$ _ K	$ _ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Pilot plant for destruction of dioxins/furans and other halogenated hydrocarbons

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Origin, reduction and health effects of PCDD/PCDF-emissions from municipal waste incinerators

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Baubehörde Hamburg, Amt für Stadtreinigung, Bullerdeich 19, D-2000 Hamburg 26, Tel.: 040/257951

Schaffner

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Umweltbundesamt, Bismarckplatz 1, D-1000 Berlin 33, Tel.: 030/8903-421

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IDENTIFYING NUMBER: 1430357 **STARTING DATE:** 1/10/84 **COMPLETION DATE:** 31/12/86

GOAL/RATIONALE/SCOPE:
This project is part of a FRG-program to investigate PCDD/PCDF-formation and destruction in municipal waste incinerators. This projects main objective: Investigation and assessment of interrelationships between combustion paramters (combustion temperature, residence time, oxygen availability, carbon monoxide concentration in the flue gas) and PCDD/PCDF-formation. Development of strategies to avoid PCDD/PCDF-formation.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 222.000 K	$ 499.000 K	$ 72.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
	Sources	Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) xxx (B) xxx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Behaviour of TCDD-Isomers During Ozonation

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Scholz, Institut Fresenius, Im Maissel 14, 6204 Taunusstein/Neuhof

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Deutsche Forschungsgemeinschaft

IDENTIFYING NUMBER: SCH 0 323/1-1 **STARTING DATE:** 15 / 1 / 85 **COMPLETION DATE:** 15 / 1 / 86

GOAL/RATIONALE/SCOPE:

Degradation of TCDD by ozone, determination of the kinetics

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical reports

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties Analytical Methods	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Emissions of municipal incinerators

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. A.A. Sein, National Institute of Public Health and Environmental Hygiene
P.O. Box 1, 3720 BA BILTHOVEN
tel. (30) 740047

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Ministry of Housing, Physical Planning and Environment, P.O. Box 450, 2260 MB LEIDSCHENDAM
dr. J.A. van Zorge
tel. (70) 209367 ext. 2840

IDENTIFYING NUMBER: 841902 **STARTING DATE:** 01/11/83 **COMPLETION DATE:** 01/12/88

GOAL/RATIONALE/SCOPE:

. Emissions of burning municipal waste in grate furnaces
.Formation of PCDD/PCDF under varying burning conditions and waste composition
. Immission concentrations near municipal waste incinerators
.Toxicological aspects of waste incineration (bottom ash, fly ash and stack ash)

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 126 K	$ 380 K	$ 263 K	$ 25 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

1986: technical reports on: Emission of municipal waste incineration
Conditions during burning experiments
Immission calculations
Bioanalytical test procedures
Conclusions of intermediate results

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	2378 TCDD TCDD PCDD PCDF Other Compounds Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Canada

TITLE OF PROJECT OR ACTIVITY: Sales of Dioxin-Containing Chemicals

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Arthur Sheffield
Commercial Chemicals Branch
Environment Canada
Ottawa, Ontario K1A 0E7

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

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IDENTIFYING NUMBER: _____ STARTING DATE: / /84 COMPLETION DATE: Continuous Annual Exercise

GOAL/RATIONALE/SCOPE: Provide sales statistics on dioxin-containing chemicals in support of dioxin activity plan for Canada. Potential to perform trend analysis on the use of these chemicals in FY 87/88.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ - K	$ - K	$ - K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Summary of sales data from non-confidential sources.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	[Sources]	Manufacturing Incineration Internal Combustion Engines [End Products/Use] Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental [Manufacturing Products] Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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Report Number 170

International Exchange of Research and Technology Information on Dioxins and Related Compounds

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** USA

TITLE OF PROJECT OR ACTIVITY: SITE DEMONSTRATION: ENVIRONMENTAL RESTORATION TECHNOLOGY--PILOT SCALE THERMAL DESORPTION/ULTRAVIOLET PHOTOLYSIS FIELD TRIAL

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Mr. Jeffrey J. Short
HQ AFESC/RDVW
Tyndall AFB FL
(904) 283-2942

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (include name of Project Officer)

Idaho National Engineering Laboratories
Department of Energy
Idaho Falls ID

559.2

IDENTIFYING NUMBER: JON: 2103 9027 **STARTING DATE:** 18/MAR/85 **COMPLETION DATE:** 31/AUG/87

GOAL/RATIONALE/SCOPE: Determine the efficacy of the thermal desorption/ultraviolet photolysis pilot-scale unit to remove and destroy dioxin from coral based soils.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 200 K	$ 559 K	$ 50 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical report on pilot scale demonstration

KEY WORDS: (circle appropriate key words on reverse side)

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Key Words (circle appropriate key words)

Working Group	Select one only:	Select one.	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	
	Analytical Methods			Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:

Practical strategies for the reduction of PCDD/PCDF-formation in municipal waste incinerators

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Berliner Stadtreinigungsbetriebe, Ringbahnstraße 96, D-1000 Berlin 42,
Tel.: 030/759 25 49

Sierig

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Umweltbundesamt, Bismarckplatz 1, D-1000 Berlin 33, Tel.: 030/8903-421

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IDENTIFYING NUMBER: 1430378 **STARTING DATE:** 1 / 4 / 85 **COMPLETION DATE:** 31 / 3 / 87

GOAL/RATIONALE/SCOPE:

This project is part of a FRG-program to investigate PCDD/PCDF-formation and destruction in municipal waste incinerators.
This projects main objective: Investigation of the influence of waste quality residence time and oxygen availability on PCDD/PCDF-formation.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 253.000 K	$ 348.000 K	$ 249.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
	Destruction	Incineration	Soil	Human
		Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Canada

TITLE OF PROJECT OR ACTIVITY: To determine levels of PCDD's/PCDF's in Agricultural chemicals, i.e., MCPA, 2,4-D, pentachlorophenol and Dicamba

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. J. Singh, Laboratory Services Division, Agriculture Canada,
C.E.F., Bldg. #22, Ottawa, Ont. K1A 0C6 (613) 995-4907

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Agriculture Canada, Ottawa, Ontario

IDENTIFYING NUMBER: _____ STARTING DATE: 1 / 04 / 87 COMPLETION DATE: 31 / 03 / 88

GOAL/RATIONALE/SCOPE:

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ 30.00 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Scientific Publication and Internal Technical Reports

KEY WORDS: (circle appropriate key words on reverse side)

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) xAx (B) xCx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Feasibility Study of an Interim Store for medium-term Storage of Highly Contaminated Landfill Dust

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. A. Solwennicke, Strabag Bau AG, Postfach 21 11 20, 5000 Köln 21, (0221) 82401

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Freie und Hansestadt Hamburg, Baubehörde, Postfach 30 05 80, 2000 Hamburg 36, (040) 34913-1

IDENTIFYING NUMBER: 144 038 700 **STARTING DATE:** 1 / 12 / 85 **COMPLETION DATE:** 30 / 4 / 86

GOAL/RATIONALE/SCOPE:
Study of the possibility of interim storage of dust containing dioxins

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 59 K	$ 59 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical	Bioaccumulation Bioavailability Biotransformation	Other Compounds
	Analytical Methods	Reactivity/Stability Biological Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Waste Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:

QUALITY ASSURANCE PROGRAM FOR CDD/CDF AND OTHER ORGANICS/INORGANICS IN EMISSIONS FROM MUNICIPAL INCINERATORS.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Ms. D.L. Stevens (416-630-6331)
Concord Scientific Corp.
2 Tippett Road
Downsview, Ontario, CANADA M3H 2V2

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

V. Ozvacic (416-965-5776)
Ontario Ministry of Environment
Air Resources Branch
880 Bay St., 4th Floor
Toronto, Ontario, CANADA M5S 1Z8

IDENTIFYING NUMBER: _____ STARTING DATE: 01/04/85 COMPLETION DATE: 30/03/87

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GOAL/RATIONALE/SCOPE:

Support for Environment Canada NITEP program.
Provide analytical QA/AC for emissions measurements in municipal waste incinerators.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 20 K	$ 20 K	$ 70 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Reports, Journal Publications

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: USA

TITLE OF PROJECT OR ACTIVITY: SITE DEMONSTRATION: ENVIRONMENTAL RESTORATION TECHNOLOGY--FULL SCALE INCINERATOR FIELD TRIAL

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Major Terry L. Stoddart
HQ AFESC/RDVW
Tyndall AFB FL 32403
(904) 283-2942

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Idaho National Engineering Laboratories
Department of Energy
Idaho Falls ID

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IDENTIFYING NUMBER: JON: 2103 9027 STARTING DATE: 4 /JAN /86 COMPLETION DATE: 1 /DEC /87

GOAL/RATIONALE/SCOPE: Determine reliability, maintainability and cost-effectiveness of a transportable full-scale incinerator at a dioxin-contaminated site.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 550 K	$ 4950 K	$ 75 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
Technical Reports on test burn, trial burn, and continuous operation activities.

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KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic (2378 TCDD) TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge (Soil) Sediment (Water) (Air) Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	(Destruction)	(Incineration) Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:

Monitoring programme of hospital waste incinerators

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Technischer Überwachungsverein Bayern e. V., P.O. Box 21 04 20, D-8000 München, Tel.: 089/57910

Straberger

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Bayer. Landesamt für Umweltschutz, Rosenkavalierplatz 3, D-8000 München 81, Tel.: 089/9214-1

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IDENTIFYING NUMBER: _____ **STARTING DATE:** 1 / 9 / 85 **COMPLETION DATE:** 31 / 3 / 86

GOAL/RATIONALE/SCOPE:

Assessment of the emission behaviour of three representative Bavarian hospital waste incinerators with special respect to the formation of PCDD and PCDF by means of an extensive monitoring programme.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

Total costs: DM 203.568,-- (excl. sales tax)

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC
	Analytical Methods	Sampling		Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: DENMARK

TITLE OF PROJECT OR ACTIVITY:

Dioxin emissions from straw combustion.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Technological Institute, Chemical Dept.

DK-2630 Taastrup, Denmark.

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Storstroms Amtskommune(a county)

DK-4800 Nykobing Falster, Denmark.

IDENTIFYING NUMBER: _____ STARTING DATE: / / 85 COMPLETION DATE: / / 86

GOAL/RATIONALE/SCOPE:

See title. Restricted to district heating units.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0 K	$ ~20 K	$ 0 K	$ 0 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Standards QA/QC Methods Research
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources straw	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** DENMARK

TITLE OF PROJECT OR ACTIVITY:

Waste oil incinerator test.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Technological Institute, Chemical Department.

DK-2630 Taastrup, Denmark.

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Prom Chemicals Ltd.

DK-4771 Kalvehave, Denmark

IDENTIFYING NUMBER: _____ **STARTING DATE:** 1/10/86 **COMPLETION DATE:** 1/1/87

GOAL/RATIONALE/SCOPE:

See title.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0 K	$ ~25 K	$ 0 K	$ 0 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical report.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration waste oil Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: DENMARK

TITLE OF PROJECT OR ACTIVITY:

Stationary diesel engine performance test.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Technological Institute

Chemical Department, DK-2630 Taastrup, Denmark.

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

MAN B&W,

Stamholmen 161,DK-2650 Hvidovre, Denmark

IDENTIFYING NUMBER: _____ STARTING DATE: / 1 /88 COMPLETION DATE: / 3/88

GOAL/RATIONALE/SCOPE:

Emission Test for Trace organics including PCDDs and PCDFs.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0 K	$ 0 K	$ 0 K	$ ~20 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: Denmark

TITLE OF PROJECT OR ACTIVITY:

Waste oil incinerator test.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Technological Institute , Chem Dept.

DK-2860 Taastrup, Denmark.

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Storstroms Amtskommune(a county)

Parkvej 37, DK 4800 Nykobing Falster, Denmark.

IDENTIFYING NUMBER: _____ STARTING DATE: 1/10/87 COMPLETION DATE: 1/2/88

GOAL/RATIONALE/SCOPE:

See title.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 0 K	$ 0 K	$ ~25 K	$ 0 K	$ 0 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical report.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration waste oil Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) XX / 9 / XX **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Study of the Causes and Reduction of PCDD/PCDF Emissions at a Waste Incineration Plant in Hamburg

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. R.W. Ullrich, Technischer Überwachungsverein Norddeutschland, Postfach 54 02 20, 2000 Hamburg 54, (040) 85571

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Freie und Hansestadt Hamburg, Amt für Stadtreinigung

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IDENTIFYING NUMBER: R 502-93633 **STARTING DATE:** 1/6/85 **COMPLETION DATE:** 31/10/86

GOAL/RATIONALE/SCOPE:
Reduction of PCDD/PCDF emissions at waste incinerators

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 59 K	$ 88 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemokinetics	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling		
	Analytical Methods			
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
CORRELATION OF INCINERATOR CONDITIONS WITH CDD/CDF EMISSIONS

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
J. Visalli (518-465-6251)
New York State Energy Research and Development Authority
Albany, N.Y., U.S.A.

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
V. Ozvacic (416-965-5776)
Ontario Ministry of Environment
Air Resources Branch
880 Bay St., 4th Floor
Toronto,Ontario, CANADA M5S 1Z8

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: 30/03/87

GOAL/RATIONALE/SCOPE:

Correlate process conditions with dioxin emissions (Pittsfield Incinerator).

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 25K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

orking Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation	Other Compounds
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: CANADA

TITLE OF PROJECT OR ACTIVITY:
INVESTIGATION OF CDDs/CDFs IN EMISSIONS FROM PULP & PAPER INDUSTRY

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Mr. W. Vrooman
Ontario Ministry of Environment
Thunder Bay Regional Office
P.O. Box 5000, 3rd Floor, 435 James St. S.
Thunder Bay, Ontario, CANADA P7C 5G6

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)
Dr. R.E. Clement (416-235-5896)
Ontario Ministry of Environment
Laboratory Services Branch
P.O. Box 213 (125 Resources Rd.)
Rexdale, Ontario, CANADA M9W 5L1

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / / Uncertain

GOAL/RATIONALE/SCOPE:

To examine effluents and sludges from Pulp & Paper Industry Plants for for CDDs/CDFs.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 40 K	$ 60 K	$ 40 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical Report, Journal Publications.

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

orking Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic ~~2378 TCDD~~ ~~TCDD~~ ~~PCDD~~ ~~PCDF~~
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation Equivalency	Other Compounds Standards
	Analytical Methods	Biological Sampling	Chemicokinetics	QA/QC ~~Methods Research~~
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use ~~Other Sources~~	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	~~Wastes~~ ~~Sludge~~ ~~Soil~~ ~~Sediment~~ ~~Water~~ Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Origin and reduction of PCDD/PCDF-emissions from municipal waste incinerators in Schleswig-Holstein

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Müllverbrennungsanlage Stapelfeld GmbH, Ahrensburger Weg 4, D-2000 Stapelfeld, Tel.: 040/675060

Wahl

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Umweltbundesamt, Bismarckplatz 1, D-1000 Berlin 33, Tel.: 030/8903-421

587

IDENTIFYING NUMBER: 1430379 **STARTING DATE:** 1/1/85 **COMPLETION DATE:** 31/12/86

GOAL/RATIONALE/SCOPE:
This project is part of a FRG-program to investigate PCDD/PCDF-formation and destruction in municipal waste incinerators. This projects main objective: Investigation of the influence of grate and boiler construction, flue gas cleaning systems and combustion parameters on PCDD/PCDF-formation.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 210.000 K	$ 907.000 K	$ _ K	$ _ K	$ _ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	2378 TCDD TCDD PCDD PCDF Other Compounds Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods		Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes in: Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY: Causes and Removal of PCDD/PCDF Emissions from three waste incineration plants in Schleswig-Holstein

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

H. Wahl, Müllverbrennungsanlage Stapelfeld GmbH, Ahrensburger Weg, 2000 Stapelfeld, (040) 675 060

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Umweltbundesamt, H. Barniske, Bismarckplatz 1, 1000 Berlin 33, (030) 8903-421

589

IDENTIFYING NUMBER: 143 03 79/3 **STARTING DATE:** 1 / 1 / 85 **COMPLETION DATE:** 30 / 6 / 87

GOAL/RATIONALE/SCOPE:

Reduction of PCDD/PCDF emissions at waste incineration plants by technical and operational optimization measures

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$337. K	$ 767. K	$ 413. K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Determination of soil contamination on selected places where open air combustion has taken place of waste electrical products and cars.

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. R.C.C. Wegman, National Institute of ~~Health~~ Public and Environmental ~~P~~ Hygiene, P.O. Box 1, 3720 BA BILTHOVEN
tel. (30) 742871

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Ministry of Housing, Physical Planning and Environment, P.O. Box 450, 2260 MB LEIDSCHENDAM
dr. J.A. van Zorge
tel. (70) 209367 ext. 2840

IDENTIFYING NUMBER: _____ **STARTING DATE:** 01/01/88 **COMPLETION DATE:** 01/06/88

GOAL/RATIONALE/SCOPE: Determination of possible contamination of soil with PCDD/PCDF by (illegal) activities

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

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Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Netherlands

TITLE OF PROJECT OR ACTIVITY: Dioxins in pesticides and related compounds

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

dr. R.C.C. Wegman, National Institute of Public Health and Environmental Hygiene
P.O. Box 1, 3720 BA BILTHOVEN
tel. (30) 742871

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Ministry of Wellfare, Health and Cultural Affairs, P.O. Box 5406, 2280 HK RIJSWIJK
dr. L.J. Schuddeboom
tel. (70) 407911

IDENTIFYING NUMBER: 638301 **STARTING DATE:** 01 /01 /86 **COMPLETION DATE:** 01 /01 /88

GOAL/RATIONALE/SCOPE: Determination of PCDD and PCDF in pesticides which are used in the Netherlands in order to measure the effects of legislation to the level of concentrations.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ 30 K	$ 30 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report, publication in scientific journal

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	(Monitoring)	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	(2378 TCDD)
		Effects	Pharmacological	(TCDD)
				(PCDD)
				(PCDF)
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	(Sources)	Internal Combustion Engines		
		(End Products/Use)		
		Other Sources		
		Incineration	Wastes	Food
		Detoxification	Sludge	Animal
		Physicochemical	Soil	Human
	Destruction	Biological	Sediment	Environmental
		Environmental	Water	(Manufacturing Products)
			Air	Plant
			Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			(Surveillance/Monitoring)	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) xxxx (B) xxxx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Measurement of PCDD/PCDF Contents in Waste Oil and Secondary Raffinates as well as Emission Measurements at a Waste Oil Refinery

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. G.J. Wentrup, Technischer Überwachungsverein Hannover e. V., Postfach 81 07 40, 3000 Hannover 81, (0511) 83391

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Umweltbundesamt, Bismarckplatz 1, 1000 Berlin 33,
(030) 8903-1 (Dr. Müller)

595

IDENTIFYING NUMBER: 104 03 360 **STARTING DATE:** 24 / 7 / 85 **COMPLETION DATE:** 30 / 4 / 86

GOAL/RATIONALE/SCOPE:

generation of dioxins and furanes from PCB in waste oil

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1989
FUNDING	$ 133 K	$ 118 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Biological Treatment of Dioxin Contaminated Leachate from the Landfill Hamburg/Georgsverder

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Prof. Wilderer, TU-Hamburg, Eißendorferstr. 38, D-2100 Hamburg 90, Tel.: 040/771702645;
Dr. Zarth, Baubehörde, WSF, Bleichenbrücke 17, D-2000 Hamburg 36, Tel.: 040/349132738
(to be contacted for further informations)

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Dr. Nels, Umweltbundesamt, Bismarckplatz 1, D-1000 Berlin 33, Tel.: 030/8903-267;
Dr. Zarth, Baubehörde, WSF, Bleichenbrücke 17, 2000 Hamburg 36, Tel.: 040/349132738

597

IDENTIFYING NUMBER: 1440386 B7 **STARTING DATE:** 1/7/85 **COMPLETION DATE:** 1/7/88

GOAL/RATIONALE/SCOPE:
Laboratory and pilot scale examination on physical (phase separation, adsorption) and biological (sequencing batch reactor, SBR) treatment of leachate from a combined household and industrial waste landfill containing PCDDs/PCDFs pestizides, chlorinated hydrocarbons and phenols etc.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 200.000 K	$ 200.000 K	$ 200.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
1) Treatability of leachate from the Georgsverder landfill using sequencing batch reactors. Baubehörde Hamburg, 1985
2) Vorschlag für ein Konzept zur Behandlung gefährlicher Stauflüssigkeiten aus der Hamburger Mülldeponie Georgsverder. Korrespondenz Abwasser 32, S. 998-1002, 1985
3) Research Reports each year

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources		
	Destruction	Incineration	Wastes	Food
		Detoxification	Sludge	Animal
		Physicochemical	Soil	Human
		Biological	Sediment	Environmental
		Environmental	Water	Manufacturing Products
			Air	Plant
			Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) xxAxx (B) xCxx **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
New Processes and Methods for Remedial Measures at of Abandoned Sites Demonstrated at the Landfill Georgswerder (subproject)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
K. Wolf, Freie und Hansestadt Hamburg, Baubehörde, Postfach 30 05 80, 2000 Hamburg 36

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)
Umweltbundesamt, Bismarckplatz 1, 1000 Berlin 33, (030) 8903-261, (Ch. Nels)

599

IDENTIFYING NUMBER: 144 03 92 II/8 **STARTING DATE:** 1 / 7 / 85 **COMPLETION DATE:** 30 / 9 / 86

GOAL/RATIONALE/SCOPE:
Project design of a hazardous waste incineration plant for the incineration of dioxin containing wastes of the landfill Georgswerder

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1986	1987	1988	1988
FUNDING	$590 K	$ 885 K	$ K	$. K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
	Destruction	Incineration	Soil	Human
		Detoxification	Sediment	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) xxx (B) xxxx COUNTRY OF ORIGIN: Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
New Processes and Methods for Remedial Measures at Abandoned Sites Demonstrated at the Landfill Georgswerder (subproject)

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
K. Wolf, Freie und Hansestadt Hamburg, Baubehörde, Postfach 30 05 80,
2000 Hamburg 36, (040) 349 13-1

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Umweltbundesamt, Bismarckplatz 1, 1000 Berlin 33, (030) 8903-261

601

IDENTIFYING NUMBER: 144 03 87 C/0 STARTING DATE: 1 /7 /85 COMPLETION DATE: 30 /11/86

GOAL/RATIONALE/SCOPE:
Feasibility study on the safeguarding and environment neutral interim storage of dioxin-containing wastes

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1986	1988	1987	1988	1989
FUNDING	$ 29 K	$ 89 K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation	Other Compounds
	Analytical Methods	Sampling	Equivalency Chemokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A (B) C COUNTRY OF ORIGIN: U.K.

TITLE OF PROJECT OR ACTIVITY:

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

M.J. Woodfield
Warren Spring Laboratory
Gunnels Wood Road
Stevenage Herts SG1 2BX 043831 3388

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

A.J. Smith
Dept of Environment
Romney House
Marsham St. SW1P 3PY 01-212-8975

603

IDENTIFYING NUMBER: DGR 481/169 STARTING DATE: 1 / 4 / 85 COMPLETION DATE: 31 / 3 / 88

GOAL/RATIONALE/SCOPE: To isolate sources and obtain concentrations and quantities.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 142 K	$ 224 K	$ 181 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Tech. Reports

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
		Reactivity/Stability	Equivalency	Standards
	Analytical Methods	Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C		Emergency	Decontamination	
	Response	Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) B C COUNTRY OF ORIGIN: WHO Regional Office for Europe

TITLE OF PROJECT OR ACTIVITY: PCBs, PCDDs and PCDFs - Prevention and Control of Accidental Exposure to Polychlorinated Biphenyls, Dibenzo-p-Dioxins and Dibenzofurans

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:
Dr. E. Yrjanheikki (coordinator) and Dr. S. Tarkowski
WHO Regional Office for Europe
8 Scherfigsvej
2100 Copenhagen 0 Tel: (01) 290111

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)
Finnish National Board of Health and the Institute of Occupational Health, Helsinki
Topelinksenkatu 41A, 00250 Helsinki
Tel: (90) 47471

605

IDENTIFYING NUMBER: _____ STARTING DATE: 1/1/85 COMPLETION DATE: 28/2/87

GOAL/RATIONALE/SCOPE: Guidelines to prevent accidents involving the release of PCBs, PCDDs and PCDFs and to prevent exposure to these chemicals. Guidelines and instructions for activities in the case of such accidents and for the proper treatment and disposal of PCB wastes and for substitution of PCBs in use.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 15 K	$ 20 K	$ 3 K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Technical document published in WHO/EURO Environmental Health Service Series in early part of 1987

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) (A) (B) C **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:
Occupational Health and Safety Regulation and Analytical Screening Programs for the Clean-up of the Landfill Hamburg/Georgswerder containing PCDDs/PCDFs

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. Zarth und Herr Wolf, Baubehörde, WSF, Bleichenbrücke 17, D-2000 Hamburg 36,
Tel.: 040/349132738 und 040/349132745

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Dr. Zarth, Baubehörde, WSF, Bleichenbrücke 17, D-2000 Hamburg 36, Tel.: 040/349132738

607

IDENTIFYING NUMBER: _____ **STARTING DATE:** 6/1/84 **COMPLETION DATE:** /88

GOAL/RATIONALE/SCOPE:
Comprehensive risk and exposure assessment for the clean-up procedure of the landfill Hamburg/Georgswerder containing PCDDs/PCDFs. Elaboration of a program of occupational health and safety regulations for the clean-up procedure (water impermeable soil cover, groundwater protection systems, treatment of leachate and liquid waste) of the combined household and industrialwaste landfill in Hamburg/Georgswerder. Elaboration and implementation of an analytical program surveying occupational health and safety as well as emission during the clean-up procedure

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 50.000 K	$ 50.000 K	$ 50.000 K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)
1) Arbeitsschutz-Handbuch für die Deponie Georgswerder. Baubehörde Hamburg, 1985
(Handbook: Occupational Health and Safety at the Clean-up of the Landfill Hamburg/Georgswerder, Baubehörde Hamburg, 1985).
2) Further reports

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	(Monitoring) Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation	Other Compounds
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	(Wastes) (Sludge) (Soil) Sediment Water Air Tissue	Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	(Waste Management)	Interim Storage (Exposure Control)		
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring	

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Working Group C

Management of Accidents

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B (C) COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY:
Removal of dioxin contaminated soil at Castlewood

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)
U.S. Environmental Protection Agency
Region VII
726 Minnesota Avenue
Kansas City, KS 66101
(913) 236-2800

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:
Contact Region VII for the rest of the information.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

609.2

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Biological Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B (C) COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY: Removal of dioxin contaminated soil at Minker/Stout/Romaine Creek

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

U.S. Environmental Protection Agency
Region VII
726 Minnesota Avenue
Kansas City, KS 66101
(913) 236-2800

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

Contact Region VII for the rest of the information.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Analytical Methods	Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B (C) COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY: Removal of dioxin contaminated soil at Quail Run Mobil Manner

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

U.S. Environmental Protection Agency
Region VII
726 Minnesota Avenue
Kansas City, KS 66101
(913) 236-2800

IDENTIFYING NUMBER: _____ STARTING DATE: __/__/__ COMPLETION DATE: __/__/__

GOAL/RATIONALE/SCOPE:

Contact Region VII for the rest of the information.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B (C) COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY: Capping of dioxin contaminated material at Frontenac

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

U.S. Environmental Protection Agency
Region VII
726 Minnesota Avenue
Kansas City, KS 66101
(913) 236-2800

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

Contact Region VII for the rest of the information.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics
	Analytical Methods	Sampling	2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) : A B (C) COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY: Capping of dioxin contaminated material at East North Street

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

U.S. Environmental Protection Agency
Region VII
726 Minnesota Avenue
Kansas City, KS 66101
(913) 236-2800

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

Contact Region VII for the rest of the information.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B (C) COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY: Capping of dioxin contaminated material at Community Christian Church

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

U.S. Environmental Protection Agency
Region VII
726 Minnesota Avenue
Kansas City, KS 66101
(913) 236-2800

IDENTIFYING NUMBER: _____ STARTING DATE: / / COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE:

Contact Region VII for the rest of the information.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD ~~PCDF~~ Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency ~~Remedial~~ Contingency Planning	Decontamination ~~Containment~~ Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B (C) COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY:

Dioxin Site Management

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

SAME AS BELOW

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Linda E. James, Dioxin Coordinator
Missouri Department of Natural Resouces
P.O. Box 176
Jefferson City, MO 65102
(314) 751-4758

IDENTIFYING NUMBER: N/A STARTING DATE: 8/17/83 COMPLETION DATE: unknown / /

GOAL/RATIONALE/SCOPE:

Monitoring 45 confirmed dioxin sites to insure contamination does not pose a health or environmental risk.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 148.5K	$ 148.5K	$ 148.5K	$ 148.5K	$ 148.5K

(State funds)

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

Monitoring Reports

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	(Monitoring)	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	(2378 TCDD)
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
			(Soil)	(Human)
	Destruction	Incineration	Sediment	(Environmental)
		Detoxification	Water	Manufacturing Products
		Physicochemical	Air	Plant
		Biological	Tissue	Cell Cultures
		Environmental		
	Waste Management	Interim Storage		
		(Exposure Control)		
C	(Response)	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	(Health/Safety	
			(Surveillance/Monitoring)	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B (C) COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY: Times Beach Buyout/Grant

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

SAME AS BELOW

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Linda E. James, Dioxin Coordinator
Missouri Department of Natural Resouces
P.O. Box 176
Jefferson City, MO 65102
(314) 751-4758

IDENTIFYING NUMBER: NA STARTING DATE: 6 / /83 COMPLETION DATE: 6 / /88

GOAL/RATIONALE/SCOPE:

To protect the residents of Times Beach by purchasing the property and to provide funding to the Trustee of the City of Times Beach for security, legal fees, fire protection, and other necessary expenses until the buyout is completed.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 400 K	$ 2000 K	$ 400 K	$ 2700 K	$ 400 K

(state funds only)
(Contact FEMA for federal)

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

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Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	(Monitoring) Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic (2378 TCDD) TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	
	Analytical Methods	Sampling	
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge (Soil) Sediment Water Air Tissue Food Animal (Human) Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage (Exposure Control)	
C	(Response)	Emergency Remedial Contingency Planning	Decontamination Containment (Health/Safety) (Surveillance/Monitoring)

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B (C) COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY: Minker/Stout Buyout/Monitoring

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

SAME AS BELOW

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(include name of Project Officer)

Linda E. James, Dioxin Coordinator
Missouri Department of Natural Resouces
P.O. Box 176
Jefferson City, MO 65102
(314) 751-4758

IDENTIFYING NUMBER: _____ STARTING DATE: 1 / / 83 COMPLETION DATE: ongoing / /

GOAL/RATIONALE/SCOPE:

To protect the residents of Minker/Stout by purchasing their property and to provide security and monitoring of the property until the purchase was complete.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 200 K	$ 100 K	$ 10 K	$ 10 K	$ 10 K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental	(Monitoring)	Physiologic
		Exposure	Pathways	Genetic
		Body Burden	Epidemiology	
		Risk	Transport/Mobility	(2378 TCDD)
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B	Sources	Manufacturing	Emissions	
		Incineration	Control Technology	
		Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
	Destruction	Incineration	(Soil)	(Human)
		Detoxification	(Sediment)	Environmental
		Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		(Exposure Control)		
C	(Response)	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	(Health/Safety)	
			(Surveillance/Monitoring)	

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Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological	Physiologic Genetic (2378 TCDD) TCDD PCDD PCDF
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological	Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics	Other Compounds Standards QA/QC
	Analytical Methods	Sampling		Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology	
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge (Soil) Sediment Water Air Tissue	Food Animal (Human) Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage (Exposure Control)		
C	(Response)	Emergency Remedial Contingency Planning	Decontamination Containment (Health/Safety) (Surveillance/Monitoring)	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B (C) COUNTRY OF ORIGIN: United States

TITLE OF PROJECT OR ACTIVITY:
Castlewood Relocation

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

SAME AS BELOW

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

Linda E. James, Dioxin Coordinator
Missouri Department of Natural Resouces
P.O. Box 176
Jefferson City, MO 65102
(314) 751-4758

IDENTIFYING NUMBER: _____ STARTING DATE: 5 / / 84 COMPLETION DATE: ongoing / /

GOAL/RATIONALE/SCOPE:

To minimize the exposure of residents to dioxin contamination in the community of Castlewood.

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 80 K	$ 80 K	$ 80 K	$ 40 K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

KEY WORDS: (circle appropriate key words on reverse side)

FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B (C) **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:

Dismantling and decontamination of a chemical plant

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

DEKONTA GmbH, Gesellschaft für Dekontamination mbH, Herrn R. Roth, Lotharstr. 26, D-6500 Mainz,
Tel.: 06131/232148

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

Freie und Hansestadt Hamburg, Behörde für Bezirksangelegenheiten, Naturschutz und Umweltgestaltung,
Amt für Umweltschutz, Steindamm 48, D-2000 Hamburg 1

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IDENTIFYING NUMBER: IV **STARTING DATE:** 1/1 86 **COMPLETION DATE:** open/ /

GOAL/RATIONALE/SCOPE:

site clean-up for industrial use in the future

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 500 K	$ open K	$ open K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability	Bioaccumulation Bioavailability Biotransformation
	Analytical Methods	Biological Sampling	Equivalency Chemicokinetics Standards QA/QC Methods Research
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Waste Management	Interim Storage Exposure Control	
C	Response	Emergency Remedial Contingency Planning	Decontamination Containment Health/Safety Surveillance/Monitoring

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B(C) **COUNTRY OF ORIGIN:** Federal Republic of Germany

TITLE OF PROJECT OR ACTIVITY:

site clean-up

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Prof. Dr.-Ing. O. Tabasaran, Ordinarius für Abfallwirtschaft der Universität Stuttgart, Lindpaintnerstraße 28, D-7000 Stuttgart 1, Tel.: 0711/693 966

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY: (Include name of Project Officer)

DEKONTA GmbH, Gesellschaft für Dekontamination mbH, z. H. Herrn R. Roth, Lotharstr. 26, D-6500 Mainz, Tel.: 06131/232148

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IDENTIFYING NUMBER: III **STARTING DATE:** 1/1/85 **COMPLETION DATE:** open / /

GOAL/RATIONALE/SCOPE:

soil decontamination and ground water protection

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ 500 K	$ 500 K	$ - K	$ - K	$ - K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

risk assessment, technical report

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:	
A		Environmental	Monitoring	Physiologic
		Exposure	Pathways	Genetic
	Assessment	Body Burden	Epidemiology	
		Risk	Transport/Mobility	2378 TCDD
		Effects	Pharmacological	TCDD
				PCDD
				PCDF
	Properties	Toxicity	Bioaccumulation	Other Compounds
		Synthesis	Bioavailability	
		Physicochemical	Biotransformation	
	Analytical Methods	Reactivity/Stability	Equivalency	Standards
		Biological	Chemicokinetics	QA/QC
		Sampling		Methods Research
B		Manufacturing	Emissions	
		Incineration	Control Technology	
	Sources	Internal Combustion Engines		
		End Products/Use		
		Other Sources	Wastes	Food
			Sludge	Animal
		Incineration	Soil	Human
		Detoxification	Sediment	Environmental
	Destruction	Physicochemical	Water	Manufacturing Products
		Biological	Air	Plant
		Environmental	Tissue	Cell Cultures
	Waste Management	Interim Storage		
		Exposure Control		
C	Response	Emergency	Decontamination	
		Remedial	Containment	
		Contingency Planning	Health/Safety	
			Surveillance/Monitoring	

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FORMAT FOR CCMS PILOT PROJECT

ON INTERNATIONAL INFORMATION EXCHANGE ON DIOXINS AND RELATED COMPOUNDS

WORKING GROUP: (circle one) A B C COUNTRY OF ORIGIN: Netherlands

TITLE OF PROJECT OR ACTIVITY: Dioxin analysis at low ppt level

NAME, ADDRESS, AND TELEPHONE NUMBER OF PRINCIPAL INVESTIGATOR:

Dr. M. van den Berg, Department of Veterinary Pharmacology, Pharmacy and Toxicology
State University of Utrecht, P.O. Box 80176, 3508 TD UTRECHT
tel. (30) 733614 ext. 36/38

NAME, ADDRESS AND TELEPHONE NUMBER OF SUPPORTING AGENCY:(Include name of Project Officer)

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IDENTIFYING NUMBER: _____ STARTING DATE: 01/04/87 COMPLETION DATE: / /

GOAL/RATIONALE/SCOPE: Avalable analysis capacity in case of emergencies

ESTIMATED RESOURCES (IN UNITED STATES DOLLARS TO NEAREST $1,000.)

CALENDAR YEAR	1985	1986	1987	1988	1989
FUNDING	$ K	$ K	$ K	$ K	$ K

MAJOR OUTPUTS: (e.g., technical reports, other publications, patents)

technical reports, publications in international journals

KEY WORDS: (circle appropriate key words on reverse side)

Key Words (circle appropriate key words)

Working Group	Select one only:	Select one:	Select all that apply:
A	Assessment	Environmental Exposure Body Burden Risk Effects	Monitoring Pathways Epidemiology Transport/Mobility Pharmacological Bioaccumulation Bioavailability Biotransformation Equivalency Chemicokinetics Physiologic Genetic 2378 TCDD TCDD PCDD PCDF Other Compounds Standards QA/QC Methods Research
	Properties	Toxicity Synthesis Physicochemical Reactivity/Stability Biological Sampling	
	Analytical Methods		
B	Sources	Manufacturing Incineration Internal Combustion Engines End Products/Use Other Sources	Emissions Control Technology Wastes Sludge Soil Sediment Water Air Tissue Food Animal Human Environmental Manufacturing Products Plant Cell Cultures
	Destruction	Incineration Detoxification Physicochemical Biological Environmental	
	Waste Management	Interim Storage Exposure Control	
C	(Response)	(Emergency) Remedial Contingency Planning	(Decontamination) Containment (Health/Safety) (Surveillance)/Monitoring

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